TOSHIBA

SERVICE MANUAL

NETWORK EXPANSION KIT

GA-1170

File No. SME04003700
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Ver00_2005-02

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Parts marked with "⚠" are important for maintaining the safely of the machine. Be sure to replace these parts with the replacement parts specified to maintain the safety and performance of the machine.

General Precautions for Installation/Servicing/Maintenance for the GA-1170

The installation and service should be done by a qualified service technician.

1. When installing the GA-1170 to the Equipment, be sure to follow the instructions described in the "Unpacking/Set-Up Procedure for the GA-1170" booklet which comes with each unit of the GA-1170.
2. The GA-1170 should be installed by an authorized/qualified person.
3. Before starting installation, servicing or maintenance work, be sure to turn OFF and unplug the equipment first.
4. When servicing or maintaining the GA-1170, be careful about the rotating or operation sections such as gears, pulleys, sprockets, cams, belts, etc.
5. When parts are disassembled, reassembly is basically the reverse of disassembly unless otherwise noted in this manual or other related materials. Be careful not to reassemble small parts such as screws, washers, pins, E-rings, toothed washers to the wrong places.
6. Basically, the machine should not be operated with any parts removed or disassembled.
7. Delicate parts for preventing safety hazard problems (such as switches, sensors, etc. if any) should be handled/installed/adjusted correctly.
8. Use suitable measuring instruments and tools.
9. During servicing or maintenance work, be sure to check the serial No. plate and other cautionary labels (if any) to see if they are clean and firmly fixed. If not, take appropriate actions.
10. The PC board must be stored in an anti-electrostatic bag and handled carefully using a wristband, because the ICs on it may be damaged due to static electricity. Before using the wrist band, pull out the power cord plug of the equipment and make sure that there is no uninsulated charged objects in the vicinity.
11. For the recovery and disposal of used GA-1170, consumable parts and packing materials, it is recommended that the relevant local regulations/rules should be followed.
12. After completing installation, servicing and maintenance of the GA-1170, return the GA-1170 to its original state, and check operation.

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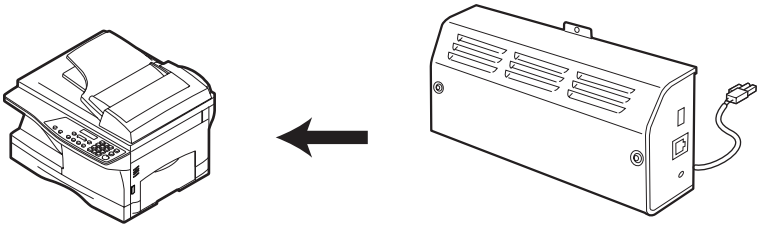
[1] CONFIGURATION



e-STUDIO162/162D
e-STUDIO151/151D

GA-1170

[2] SPECIFICATIONS

1. BASIC SPECIFICATIONS

ITEMS	SPEC
Extensible model	e-STUDIO162/162D e-STUDIO151/151D
Standard memory	64MB
Expansion memory	DIMM 1slot 144pin 128/256MB SO-DIMM
Platform of Client PC	IBM PC/AT compatible, Macintosh
Useable OS	Windows98/Me/NT4.0/2000 professional/Windows XP Home Edition/Professional Edition
	Mac OS 8.6-9.x,10.1.5,10.2-10.2.8(w/o 10.2.2)(PS option)
Required hardware(PC)	(System) The conditions of each OS which can be used are required. (HDD) Exceeding 100M is recommended. (Monitor) 800 x 600 dots (Interface) 10BASE-T/100BASE-TX Ethernet
Required software	Internet Explorer 5.5 or later Netscape Navigator 6 or later
Extensible option	PS extensible kit (GA-1180)
Network Protocol	TCP/IP, IPX/SPX, NetBEUI, Ether Talk
Emulation (The functions which can be used differ by The MFP connected)	PCL/PS (PS:Cancels by the soft key)
Network Print	PCL/PS
Network Scan (The functions which can be used differ by The MFP connected)	Scan to E-mail, Scan to FTP, Scan to Desktop
E-mail alert status	Yes (Cancels by the soft key)
Power supply	Supplies via copier (AC power supply built-in) AC120mA
Power consumption	5.5W
Outside dimension (W x D x H)	248mm x 127mm x 59mm

ITEMS	SPEC
Accessories	USB cord x 1 (for connection to Copier) Software CD-ROM x 3 Screw for installation x1 Clamp x 1 (for harness fixation) Installation manual Installation guide ∗An installation manual exists in driver CD-ROM by the pdf file format.
Bundle software	Disk1:Driver CD-ROM for e-STUDIO162/162D, e-STUDIO151/151D • PCL driver (Win) • PS driver (Win/Mac) • SMON (Win) • PAU (Win) • NIC Manager (Win) • Online manual (Win/Mac) Disk2:Network setting CD-ROM • NIC Manager (Win) • Quick Setup (Win) • SC-Print2000 (Win) • Online manual (Win/Mac) • Setup Utility (Mac) Disk3:Application CD-ROM • Desktop Document Manager (3 license)

2. FUNCTION DESCRIPTION

A. PRINT EMULATION

A difference exists in the function which can be used by execution of the basic performance and composition of the MFP to connect (print size/configuration).

(1) comparison table of main print function classified by driver

Function		PCL5e Custom Driver	PCL6 (XL)/ SPDL2 Custom Driver	PS Custom Driver	Macintosh PPD file	Windows PPD file
General	Document Style	1-Sided, 2-Sided(Book) 2-Sided(Tablet), Pamphlet Style(Tiled Pamphlet), Pamphlet Style(2-up Pamphlet)			1-Sided, 2-Sided(Book), 2-Sided(Tablet)	
	Booklet	Yes			No	
	Binding Edge	No				
	N-up	2/4/6/8/16				Win 9x : 2/4 Win2K/XP: 2/4/6/8/16
	N-up Order	Z	Z, Reverse Z, N, Reverse N			Z
	Custom Paper Size	1size				3 sizes
	Different 1st (Cover)	Yes				No
Graphic	Resolution Setting	600/300 dpi		600dpi		
	Half tone Setting	No		Yes	No	
	Graphics Mode	Raster/HP-GL2	Raster/Vector	No		
	Negative Image	No		Yes		
	Mirror Image	No		Yes		
	Fit to Page	Yes			X	
Font	Resident Font	80 fonts		136 fonts, 5 Kanji fonts (Japan only)	35 fonts, 5 Kanji fonts (Japan only)	136 fonts, 5 Kanji fonts (Japan only)
	Download font	Yes			No	Yes
Others	Configuration Setting	Yes (Automatic)				No
	Job Compression	No		Yes	No	
	Bitmap Compression	No		Yes	No	

(2) comparison table of printing function for each driver

The model to connect		e-STUDIO162/162D, e-STUDIO151/151D				
Function		PCL5e	PCL6	PS	Mac PPD	Win PPD
General	Copies	1-999				
	Orientation	Portrait/Landscape				
	Collate	Collate/Group				
	Document Style	1-Sided, 2-Sided(Book), 2-Sided(Tablet), Pamphlet Style(Tiled Pamphlet), Pamphlet Style(2-up Pamphlet)			1-Sided, 2-Sided(Book), 2-Sided(Tablet)	
	Booklet	(e-STUDIO162/162D, e-STUDIO151/151D) Invoice on Letter, A5 on A4, Letter on Letter, A4 on A4			No	
	Binding Edge	No				
	Margin Shift	No				
	N-up	2/4/6/8/16				Win9x: 2/4 Win2k/XP: 2/4/6/8/16 *2
	N-up order	Z	Z, Reverse Z, N, Reverse N			Z

The model to connect		e-STUDIO162/162D, e-STUDIO151/151D				
Function		PCL5e	PCL6	PS	Mac PPD	Win PPD
General	N-up Border	On/Off			Yes (Single hairline/Single thin line/Double hairline/Double thin line)	On/Off *2
Paper	Paper Size	(e-STUDIO162/162D, e-STUDIO151/151D) A3/B4/A4/B5/A5/B6/A6/11x17/8.5x14/8.5x13/8.5x11/5.5x8.5/Folio/Executive/COM-10/Monarch/DL/C5/8K/16K				
	Fit to Page size	(e-STUDIO162/162D, e-STUDIO151/151D) A4/B5/A5/B6/A6/8.5x14/8.5x13/8.5x11/5.5x8.5/Folio/Executive/COM-10/Monarch/DL/C5/8K/16K				
	Paper Type	No				
	Custom Paper Size	1 size			1size *1	3 sizes *2
	Source Selection	Auto/Bypass (Auto)				
		e-STUDIO162/162D, e-STUDIO151/151D: Tray 1/2				
	Different 1st (cover)	On/Off				No
	Transparency Inserts	No				
	Carbon Copy	No				
Paper Output	Output Tray Selection	No				
	Staple	No				
Graphic	Resolution Setting	600/300 dpi		600 dpi		
	Half tone Setting	No		Screen Frequency 8 to 360.0 in 0.1 steps Screen angle 0.0 to 360.0 in 0.1 steps	No	
	Graphics Mode	Raster HP-GL2	Raster Vector	No		
	Smoothing	No				
	Toner save	No				
	Half tone Enhance	No				
Graphic	Brightness	No				
	Negative Image	No		On/Off		
	Mirror Image	No		Horizontal/Vertical		
	Zoom	No			25-400%	
	Fit to Page	On/Off			No	
Font	Resident Font	80 fonts		136 fonts	35 fonts	136 fonts
	Download Font	Bitmap, TrueType, Graphics			No	Type1 True Type
Others	Configuration Setting	Yes (Automatic)				No
	ROPM	On/Off				
	Overlay	On/Off			No	
	Print Auditor	No				
	Job Retention	No				
	Watermark	On/Off			On/Off(With functional restriction)	
	Page Protection	No				
	Job Compression	No		None, Fastest, Fast, Medium, Best	No	
	Job Compression	No		None, Very High, High, Medium, Draft	No	

*1:Mac OS 10.1 is not supported.

*2:Windows NT is not supported.

(3) PDF/TIFF direct printing function

PDF and TIFF files can be specified from a web page and directly printed out.

(4) Limitations (printing function)

If a print request for GDI/SPLC data is made, an error message is printed out.

(5) Printer condition setup

The following setup can be made from the web page.

Default Setting Items

Function	Item	Default
	e-STUDIO162/162D, e-STUDIO151/151D	
Copies	1-999	1
Orientation	Portrait / Landscape	Portrait
Default Paper Size	(Overseas) •Invoice •Letter •Foolscap •Legal (Domestic) •A5 •B5 •A4 (China - size of AB system) •A5 •B5 •A4 •16K	Letter or A4
Default Paper Source	drop down box select values: •AUTO •Tray1 •Tray2 •BYPASS	AUTO
Disable Blank Page Print ∗When destination language is Japanese.	Enable/Disable	Disable
2-Sided Print	drop down box slect values: •1-SIDED •2-SIDED (BOOK) •2-SIDED (TABLET)	1-SIDED
ROPM	Enable / Disable	Disable

(6) Network status page

The network status pages shows a list of settings about the network.

Data are printed out in the A4 or letter size in US English regardless of the destination and OS language selected.

The status page can be printed out by pressing the status switch on the network expansion kit.

Note:

1. The name of the printer is printed under the item "printer name."
2. When WINS is disabled, "WINS server 1-5" is not displayed. It is displayed when a value is set or information is acquired from the DHCP server.

   Any server which responds normally to the registration of WINS is marked with an asterisk "∗".

   "WINS server" shows up to 5 values: 2 settings, 2 DHCP values, and broadcast. However, the broadcast operates only when no normal response is returned from any server.
3. The "WINS Scope ID" is displayed only when a value is set or when information is acquired from the DHCP server and more than one piece of information is valid as a WINS server.

B. NETWORK SCANNING FUNCTION

It is possible to use the MFP scanning function as a network scanner with a network scanner expansion kit. Setups can be made using a Web browser. Supported functions vary with the type of the MFP connected.

(1) Basic scanning function

Function	Item	e-STUDIO162/162D, e-STUDIO151/151D	Remarks
Network scanner	Scan to E-mail	Yes	
	Scan to Desktop	Yes	
	Scan to FTP server	Yes	
Destination	Specify e-mail address with LDAP	Yes	
	AdHoc (Enter e-mail address from MFP.)	Yes	
File format	JPEG PDF (non-compression, G3, G4) TIFF (non-compression,G4, G4)	Yes	TIFF/PDF multiple page support

(2) Scanner settings

Setting	Item	Default	Remarks
	e-STUDIO162/162D, e-STUDIO151/151D	e-STUDIO162/162D, e-STUDIO151/151D	
Scanning size		A4 (AB region) Letter (Inch-system region)	
File format	JPEG color/JPEG gray scale/PDF color/PDF gray scale/PDF monochrome, binary non-compression/PDF monochrome, binary G3 compression/PDF monochrome, binary G4 compression/TIFF color/TIFF gray scale/TIFF monochrome, binary non-compression/TIFF monochrome, binary G3 compression/TIFF monochrome, binary G4 compression	TIFF monochrome, binary G4 compression	
Color mode	Monochrome, 2 gradations/Gray scale/Full color	Monochrome, 2 gradations	Available only at the “monochrome”.
Resolution	75/100/150/200/300/400/600	75	Selectable resolutions vary with different memory capacities.
B/W threshold	1-254 (default: 128)	128	

Setting	Item		Default		Remarks
	e-STUDIO162/162D, e-STUDIO151/151D		e-STUDIO162/162D, e-STUDIO151/151D		
Light source	Red/ Green/ Blue	White/ Red/ Green/ Blue	Green	White	Light source can be selected only when the color mode is in "Monochrome".
Void	On/Off		On		When On is selected, the edges of images are cut.

(3) Send file (message and filename)

- Information contained in filename

Sender name	:	Use MFP product name.
Date & Time	:	Date and time at which file is sent
Session page counter	:	Image send counter
Unique identifier	:	Automatically created based on the information of the date and time and image send counter.

Example:
e-STUDIO162D_20000620_155114_0057_06a3f3393948.pdf

- Mail subject

  Can be freely set.

  Default: Scanned image. device name: e-STUDIOXXX (MFP product name)

  Example: Scanned image. device name: e-STUDIO162D

- Mail message

  The following messages are added to the image send mail.

Device name:	Freely set
Model:	MFP product name
Location:	Freely set
File type:	File type of send image
Resolution:	Resolution of send image

Example;
Device name :e-STUDIO162D
Model name :e-STUDIO162D
Location :D2) Planning dept.
File type :PDF MMR (G4)
Resolution :200 dpi x 200 dpi

(4) Recipient registration

[e-STUDIO162/162D, e-STUDIO151/151D]

- Up to 200 destinations can be registered on the network expansion kit to which the scan can be sent from the network scanner.
- The mail address registered for each destination can be selected from the mail address which is searched using LDAP.
- The information for each recipient includes the recipient name, IP address or mail address, scanning size, format type, and scan parameter.
- Either of LDAP-selected or directly-entered mail address scan setting is available. If the destination is a mail address entered through the main system or selected by LDAP, this scan setting is used.
- The destination name is displayed on the LCD.

(5) Scanning size

[e-STUDIO162/162D, e-STUDIO151/151D]

- Scanning size is the size set up in main unit(Copier).
  (Apply to the main scan, a subscan, ADF, and OC)

(6) Scanner limitations

[e-STUDIO162/162D, e-STUDIO151/151D]

- The scanning function is allocated to the network expansion kit. The b Button Manager settings are disabled.
- When the network expansion kit is connected, the scanner function through TWAIN (pull scan) and push scan which used button manager on pc are not available.

C. FUNCTIONS BY INTERFACE

When the network expansion kit is connected, the following functions are available by system interface.

System I/F (main unit)	GA-1170 I/F	Function				
		SPLC	GDI	PCL5e/6	PS (*1)	Net Scan
USB2.0	RJ45 (LAN)	No	No	Yes	Yes	Yes
USB1.1	→	Yes	No	No	No	No
IEEE1284	→	Yes	No	No	No	No
USB2.0	→	Yes	No	No	No	No
USB1.1	RJ45 (LAN)	No	No	Yes (*2)	Yes (*2)	No
IEEE1284	→	Yes	No	No	No	No
USB1.1	RJ45 (LAN)	No	No	Yes (*2)	Yes (*2)	No
IEEE1284	→	No	Yes	No	No	No

(*1): PS requires soft keys of the GA-1180.

(*2): Some functions are not available.

D. NETWORK SETUP

Network setups should be performed by the system administrator. Use a setup tool such as TCP/IP, Netware, Ether Talk or Web interface.

E. SOFTWARE SETUP

The network expansion kit can be installed by setting up NIC, installing a printer driver with the total installer, and installing Desktop Document Manager.

(1) Installing driver

The network expansion kit printer is connected only through the network. The port setup required for installing a printer driver is the network only. The following items should be set up.

- TCP/IP peer-to-peer port

1) Search for the network expansion kit on the network and select the network expansion kit you want or enter the IP address of the applicable network expansion kit to create a TCP/IP port.
2) Install the driver to the created port.

- Windows printer shared port

When the setup of the above client PC is completed and the printer is set to "Windows shared printer," other client PCs can select this printer shared port and then proceed to installation of the driver.

F. HARDWARE SETUP

Supplied by the main unit

[e-STUDIO162/162D, e-STUDIO151/151D]

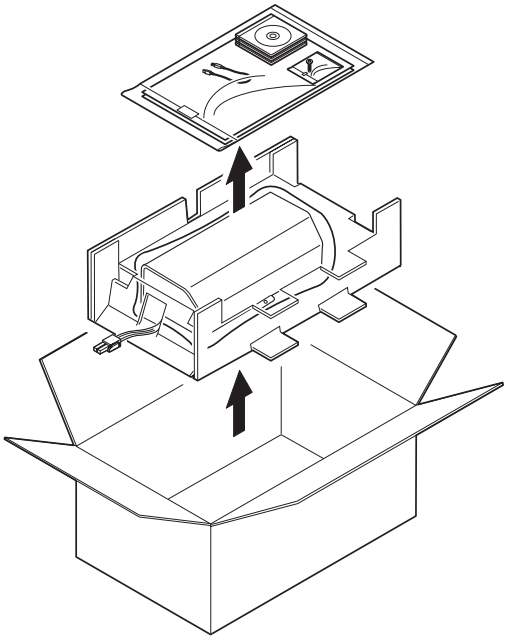
1) Connection to the system unit
   - Connect to the USB2.0 port
2) Power supply

   Supplied by the main unit.

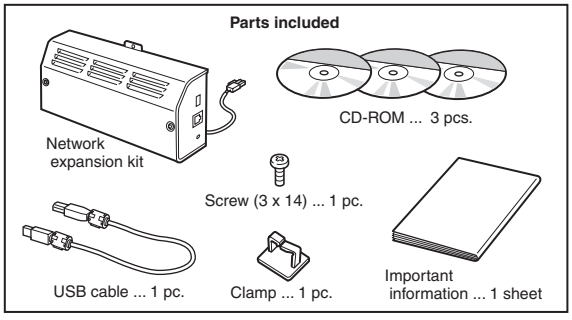
[3] UNPACKING AND INSTALLATION

The unpacking and set-up procedure shall be done by a qualified service technician.

1. UNPACKING



2. PACKAGED GOODS



3. INSTALLATION PROCEDURE

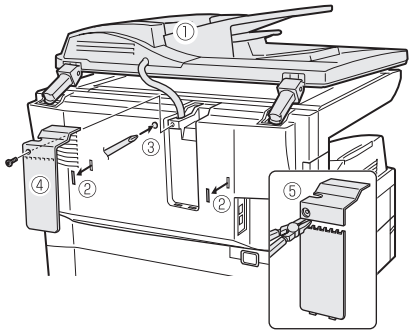
This installation procedure is provided for e-STUDIO162/162D, e-STUDIO151/151D.

For Installation to other models, see the operation manual of the main unit or the service manual.

Turn off the main switch of the main unit and remove the power plug of the copier from the outlet.

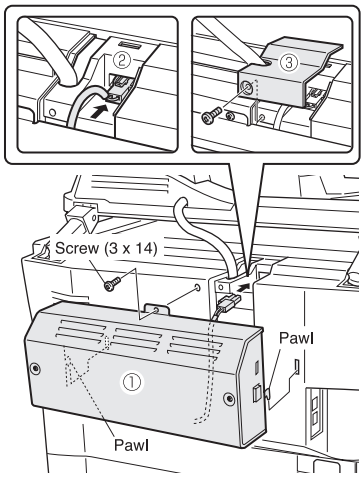
1. Cut the rear cabinet.

1) Remove the ADF/ RADF from the main unit and gently place it on the document glass as shown in the illustration.
2) Cut out two cut-out portions from the rear cabinet using a cutter or the like.
3) Use a Phillips screwdriver or the like to open a hole.
4) Remove the screw and then remove the rear cabinet cover.
5) Cut out a part of the rear cabinet cover with nippers or the like as shown in illustration.
   (Be careful about the orientation of the nippers so that the cross section is flat.)



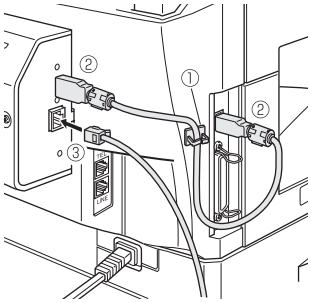
2. Attach the network expansion kit.

1) Engage the two pawls on the rear of the network expansion kit with the cutout portions of the main unit and secure the kit with the supplied screw (3 x 14).
2) Connect the connector of the network expansion kit to the connector of the main unit.
3) Secure the rear cabinet cover to the main unit with the screw.
4) Attach the ADF/ RADF to the main unit.



3. Connect the USB cable and the network cable.

1) Attach the supplied cable clamp to the position shown in the illustration.
2) Connect the USB cable to the network expansion kit and the main unit.
   At this time, reduce slack of the cable with the cable clamp as shown in the illustration.
3) Connect the network cable.



Insert the power plug of the copier to the outlet, turn the main switch of the copier to the "ON" position, and then perform network setting and installation of the software.

[4] SETUP IN A WINDOWS ENVIRONMENT

1. SETTING THE IP ADDRESS OF THE MACHINE

Before installing the printer driver, be sure to set the IP address of the machine. Consult your network administrator for the correct IP address, subnet mask, and default gateway to be entered. If a DHCP server will automatically assign an IP address to the machine, the following procedure is not necessary. (To check the IP address assigned to the machine by DHCP, see "2. CHECKING THE IP ADDRESS" .)

Note: If the machine is used in a DHCP environment, the machine's IP address may change automatically. If this happens, printing will no longer be possible. In this event, use a WINS server or do not use the machine in a DHCP environment.

1) Make sure that the LAN cable is connected to the machine and then turn on the machine.

2) Insert the network expansion kit GA-1170 "Software" CD-ROM into your computer's CD-ROM drive.

3) Click the "start" button, click "My Computer" ( ), and then double-click the CD-ROM icon ( ).

   In Windows 95/98/Me/NT 4.0/2000, double-click "My Computer" and then double-click the CD-ROM icon.

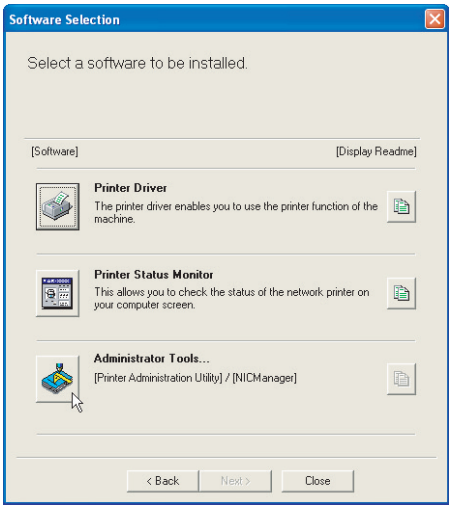
4) Double-click the "setup" icon ( ).

Note: If the language selection screen appears after you double click the "setup" icon, select the language that you wish to use and click the "Next" button. (Normally the correct language is selected automatically.)

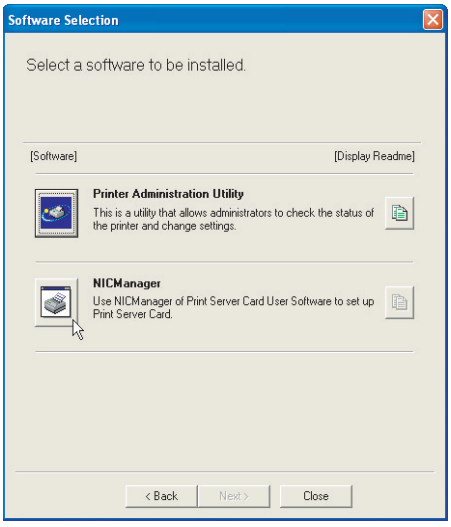
5) The "SOFTWARE LICENSE" window will appear. Make sure that you understand the contents of the license agreement, and then click the "Yes" button.

6) Read the message in the "Welcome" window and then click the "Next" button.

7) Click the "Administrator Tools" button.

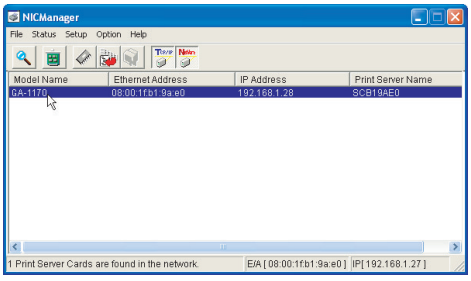


8) Click the "NICManager" button.

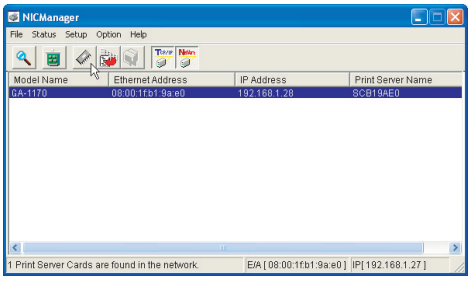


9) The printer or printers connected to the network will be detected. Click the printer to be configured (the machine).

   Select the "GA-1170".



10) Click the "Print Server Card Setup" button.



   Enter your password in the password entry screen and click "OK".

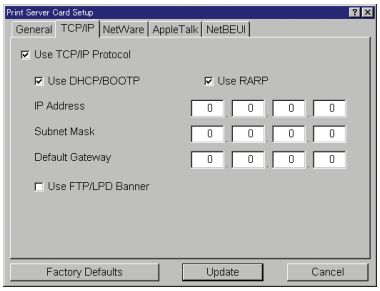
   The Print Server Card Setup window will appear.

   The password for this product has been initially set to "TOSHIBA".

   If the "Guest user" checkbox is selected, the settings can be viewed but not configured.

11) Click the "TCP/IP" tab.

12) Configure the settings and then click the "Update" button.



Be sure to ask your network administrator for the correct IP address, subnet mask, and default gateway to be entered.

13) Your changes to the settings appear.

Make sure that the changes are correct and then click the "OK" button.

14) Restart the machine.

Power off the machine and then power it back on.

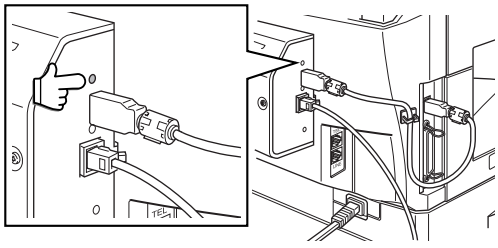
15) Select "Search" from the "File" menu.

The IP address that you entered will appear. Make sure that it is correct.

The completes the IP address settings.

2. CHECKING THE IP ADDRESS

To check the IP address of the machine, press the status button on the network expansion kit to print out a network status page.



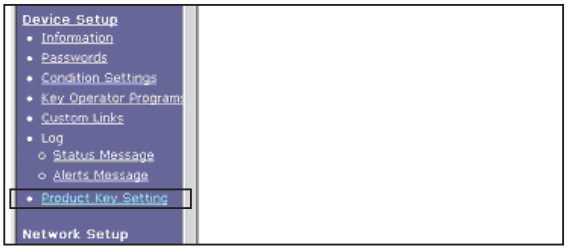
3. PRODUCT KEY SETTING

To enable the PS3 function and the e-mail status & alerts function, follow the procedures below. In addition, to enable the PS3 function, you need GA-1180 (option).

1) Make sure that the LAN cable is connected to the machine and then turn on the machine.

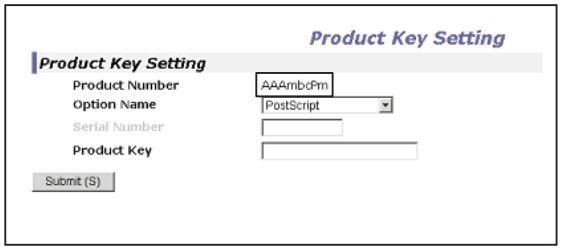
2) Enter the IP address in web browser to open the web page.

3) Select "Product Key Setting" in "Device Setup" from MENU.

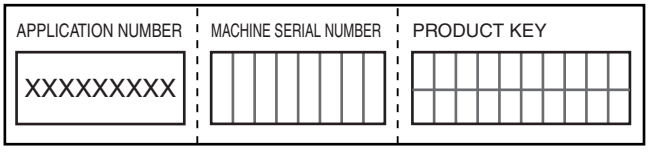


4) Set "User name" to "admin" and "Password" to "TOSHIBA" in the screen displayed.

5) Click the "OK" button to obtain the "Product Number".



6) Fill in the product number in the following column of the product sheet (MACHINE SERIAL NUMBER).



7) Obtain the product key with APPLICATION NUMBER and MACHINE SERIAL NUMBER in the product sheet.
For specific procedure to obtain the product key, contact the TOSHIBA authorized dealer.
In addition, keep the product sheet after filling in since the product key is important information.

8) Enter the product key in the web page displayed in 5), and click the "Submit" button.

This completes the PS3 setting.

9) Select "E-mail status & alerts" from the "Option Name" list in the "Product Key Setting" screen.

10) Click the "Submit" button.

This completes the e-mail status & alerts function setting.

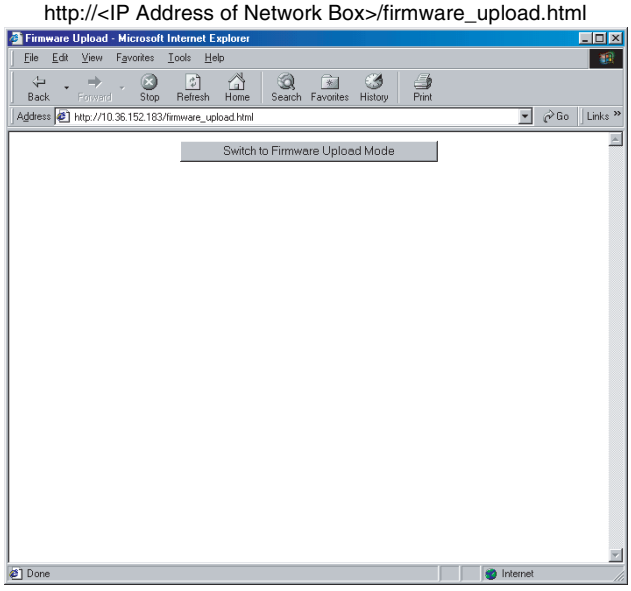
[5] Updating Network Box Firmware

Update the Network Box firmware in the following procedure using a Web browser.

1. Display the web page for updating Network Box firmware

   Start the browser on your PC and specify the following URL. A web page, as shown in Fig. 1, appears on screen.

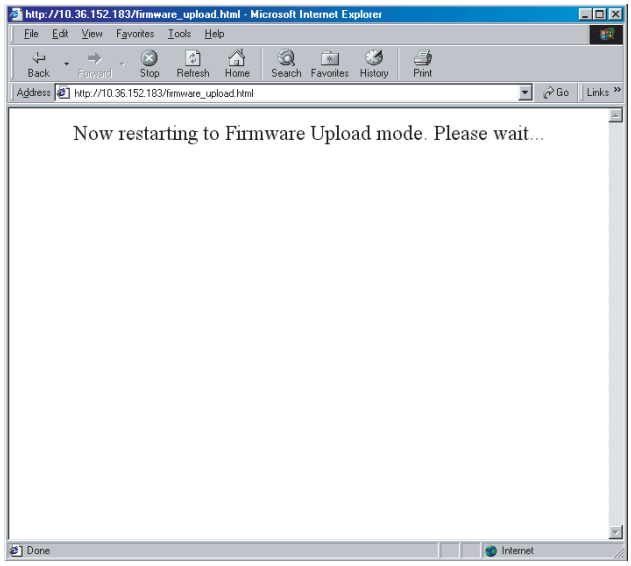
   http://<IP Address of Network Box>/firmware_upload.html



[Fig.1: Web page for updating Network Box firmware]

2. Switch to firmware upload mode

   Click the button on the screen, the message shown in Fig. 2 appears.

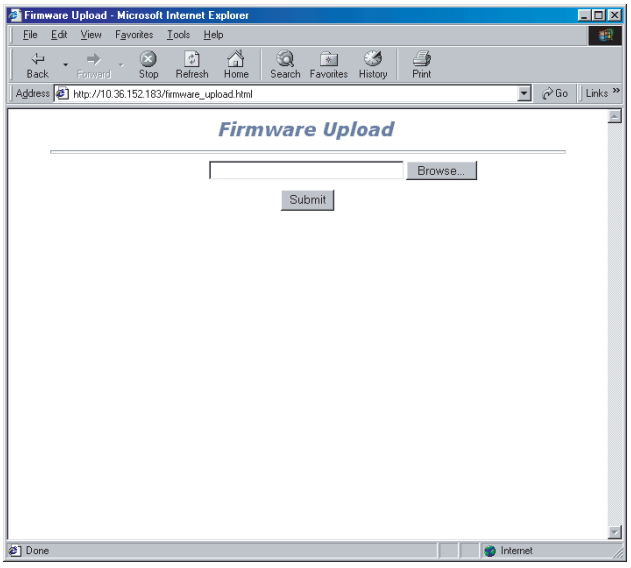


[Fig.2: Switch to firmware upload mode]

   The page changes to the Network Box firmware upload mode.

   The browser is automatically reloaded and then the screen looks like this.

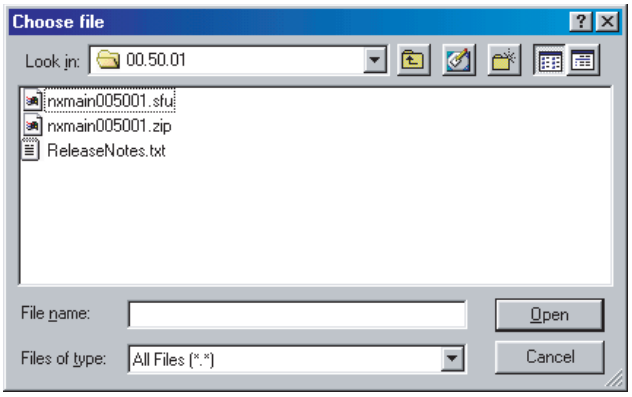
∗When the screen shown in fig.3 is not displayed, refresh a browser manually.



[Fig. 3: Upload mode]

3. Specifying the file

   Click the Browse button. Selects the firmware of the Network Box version you want to update, from the file selection menu indicated in Fig.4.



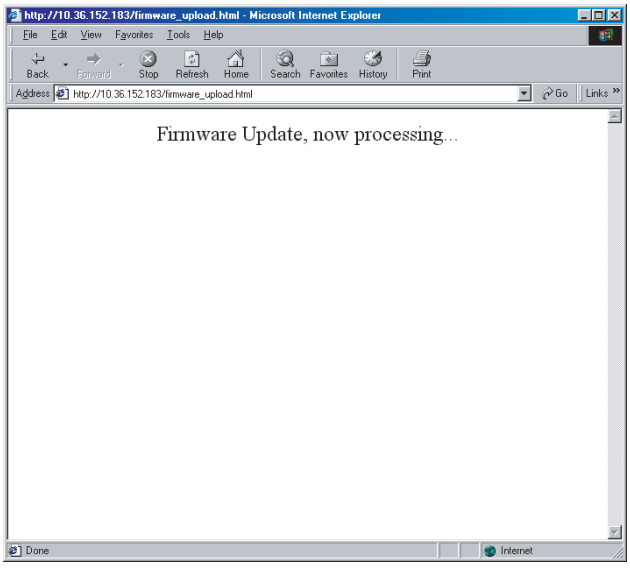
[Fig. 4: Specifying the file]

Note: If you want to set the IP address of the Network Box at first, use the NIC Manager. Select and set your model name and an appropriate Ethernet address from the list.

Both the Boot and Main files can be updated in the same procedure as mentioned above. However, when you want to update both at the same time, you need to update them separately by repeating the same procedure twice.
When updating both files, it is required to first update Boot and then Main.

4. Updating the firmware

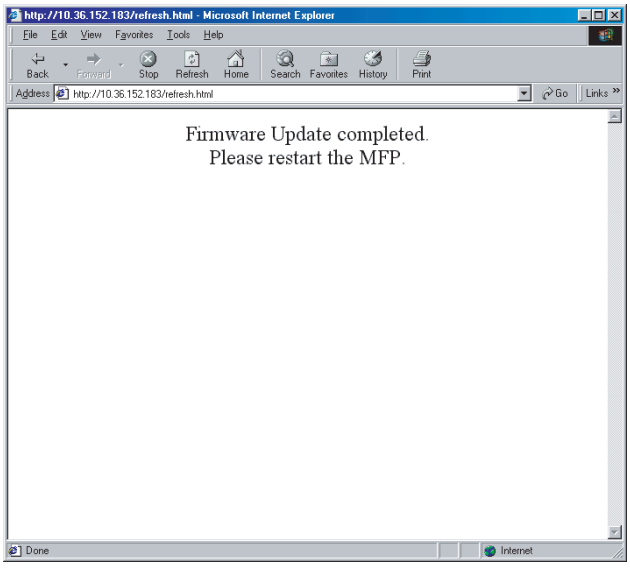
   After you select the file, click the Submit button. The firmware is transmitted to Network Box, and it is updated. The message indicated in Fig.5 blinks repeatedly until the updating process is completed. Do not turn off the power supply.



[Fig.5: Updating in progress]

5. Restarting your MFP

   When updating is completed, the message shown in Fig.6 appears on screen. Turn off the power and then turn it on again to restart Network Box.



[Fig.6: Updating completed]

Caution: If a DHCP is used, the browser may not be able to reload automatically in some cases when transferring to the upload mode because different IP addresses are read. Therefore, we recommend that you use a fixed IP address when updating firmware.

If the upload mode is operating with different IP addresses, check the IP address obtained by the Ethernet address of Network Box from the DHCP server and display the updating mode URL again using the browser.

When a proxy server is used, the screen may not be updated by reloading. In that case, you need to update manually.

[6] TROUBLE CODE

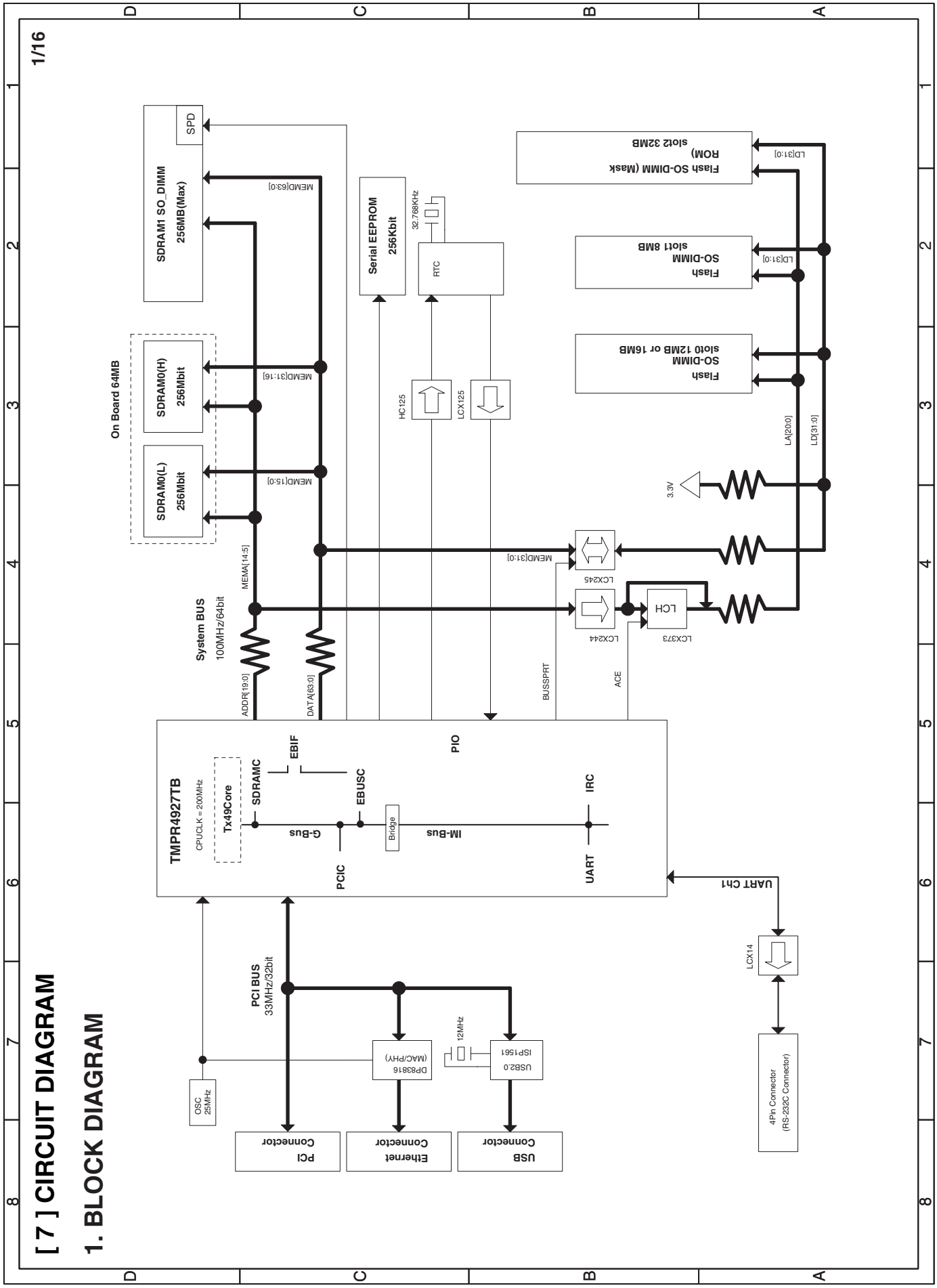
1. TROUBLE CODE (CE CODE)

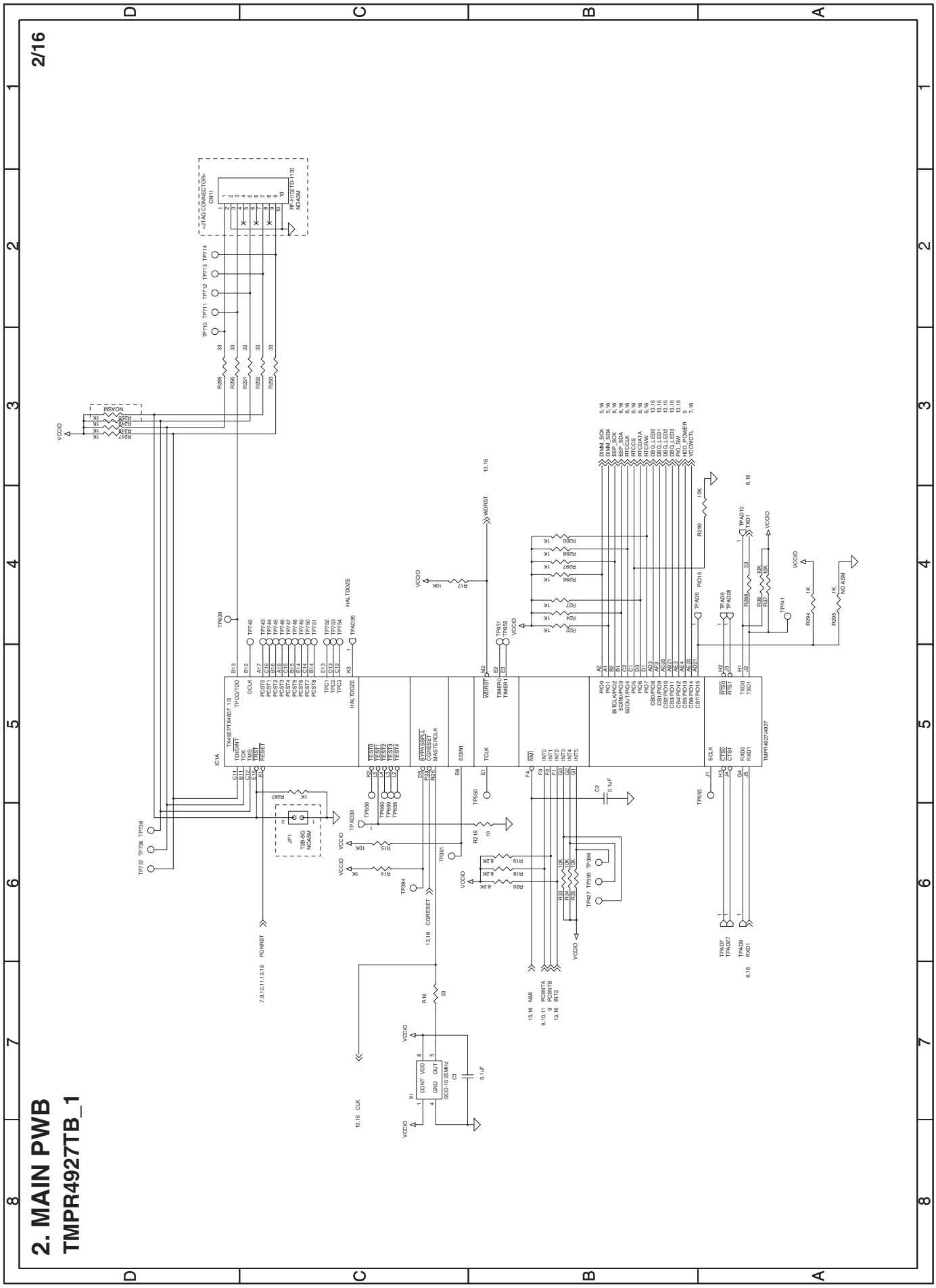
If "CE" blinks in the display, press the [START] key. An error code will appear.(Only e-STUDIO162/162D, e-STUDIO151/151D displays an error code automatically.) Solve the problem as explained below.

Error Code	Solution
CE-00	Error which cannot be specified occurred. Turn off the power and turn it back on. Consult with your network administrator to make sure that no problems exist on the network or in the server.
CE-01	Network Server card error. Turn off the power and turn it back on. Consult with your network administrator to make sure that no problems exist on the network or in the server.
CE-02	Server access denied. The scanned image was not sent because a connection to the server could not be established. Make sure that the SMTP server settings or FTP server settings in the Web page are correct.
CE-03	The scanned image was not sent because the server was busy or there was too much traffic. Wait briefly and then try again.
CE-04	It has not logged in to the FTP server and the mail server. Please reconfirm the login name and a password.
CE-05	The scanned image was not sent because the directory of the destination FTP server was not correct. Make sure that the correct FTP server information is configured in the Web page.
CE-09	The size of the scanned image file exceeds the upper limit set in "Maximum Size of File" in the Web page. Reduce the number of original pages scanned into the file, or change the upper limit set in "Maximum Size of File".
CE-10	A transmission method assigned to a [SCAN MENU] key cannot be used. Check the transmission methods assigned to the [SCAN MENU] keys in "Enable Scanner Delivery to:" in the Web page whether or not the method can be used.
CE-11	The memory filled with scanner data. It was not able to process by the size of a scanner data being too large. Please drop resolution of data by setup of scaner and retry scan.
CE-12	The quantity of the result for which LDAP searched exceeded the maximum quantity which can be searched. There are too many addresses which were in agreement with reference conditions. Please increase the number of reference characters and perform re-reference.

[7] CIRCUIT DIAGRAM

1. BLOCK DIAGRAM




2/16
2. MAIN PWB
TMPR4927TB_1
IC1A
TMPR4927TX/4837 1/5
TP7737 TP7736 TP7738
JP1
T28-SO
NO/ASM
TP9189
TP7742
TP7743 TP7744 TP7745 TP7746 TP7747 TP7748 TP7749 TP7750 TP7751 TP7752 TP7753 TP7754
TPAD35
HALTDOZE
TP9190 TP9191 TP9192 TP9193 TP9194 TP9195 TP9196 TP9197 TP9198
TP9650
TP9655
TP9656
TP9657
TP9658
TP9659
TP9660
TP9661
TP9662
TP9663
TP9664
TP9665
TP9666
TP9667
TP9668
TP9669
TP9670
TP9671
TP9672
TP9673
TP9674
TP9675
TP9676
TP9677
TP9678
TP9679
TP9680
TP9681
TP9682
TP9683
TP9684
TP9685
TP9686
TP9687
TP9688
TP9689
TP9690
TP9691
TP9692
TP9693
TP9694

TMPR4927TB_2

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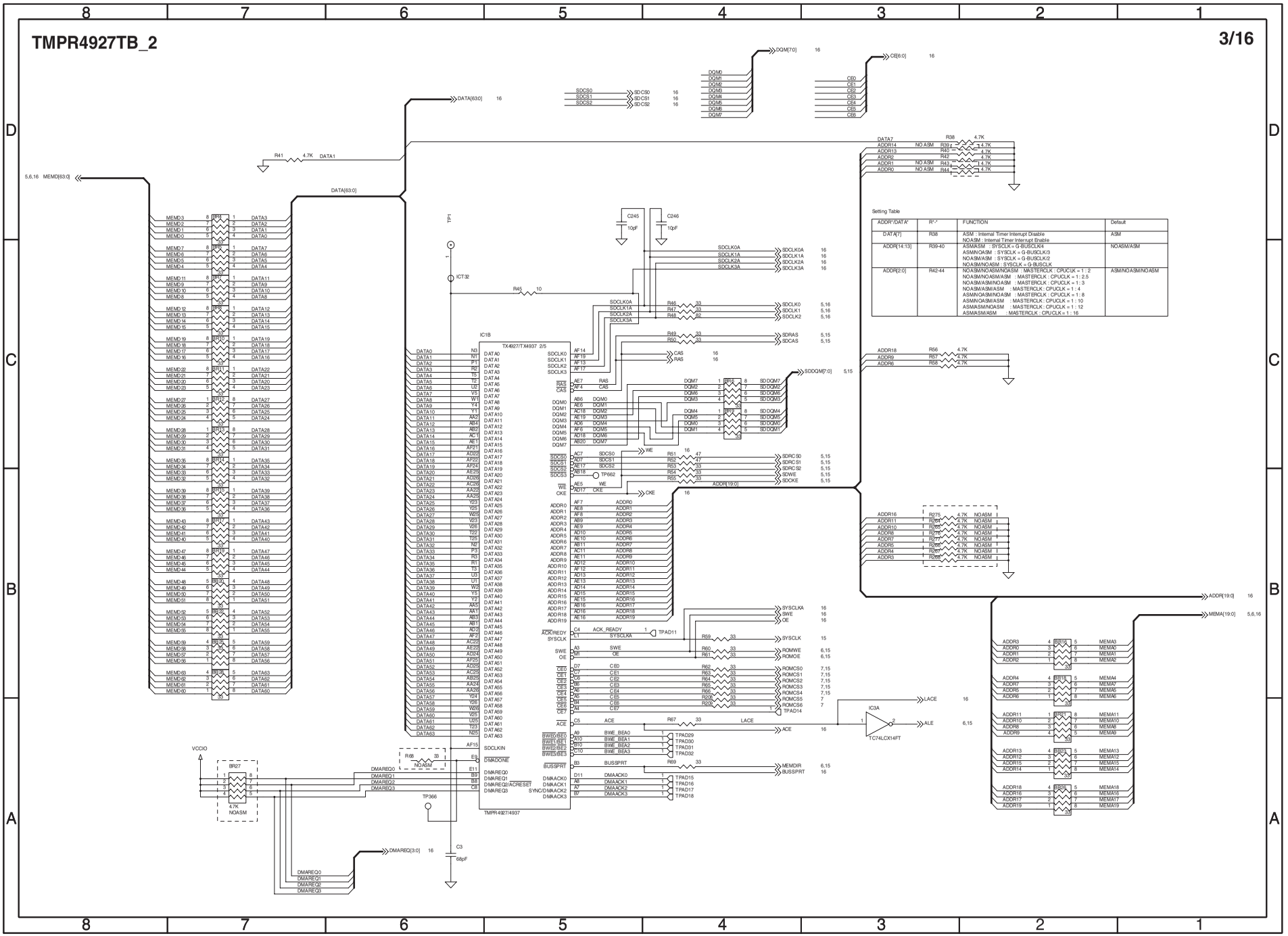
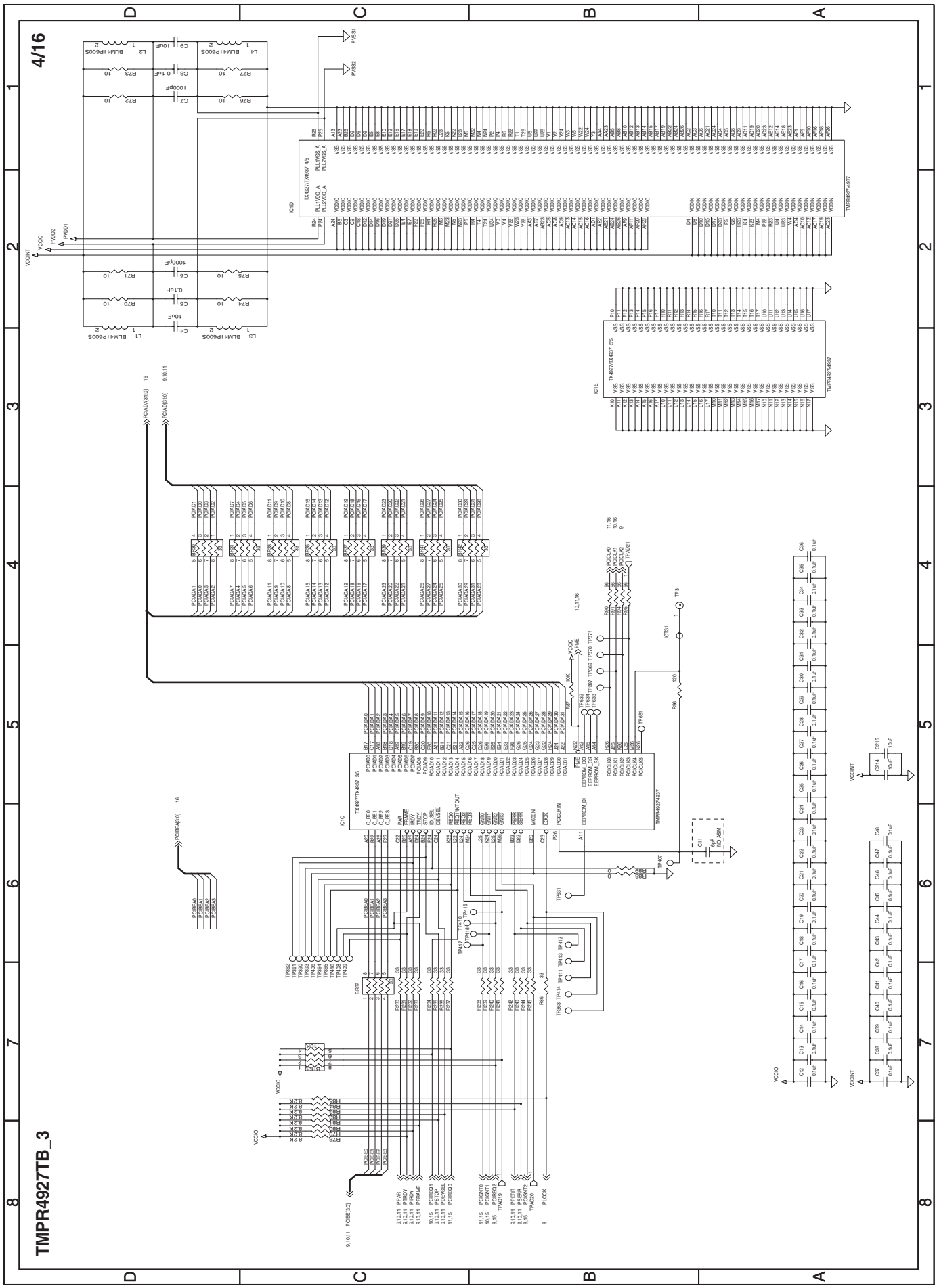


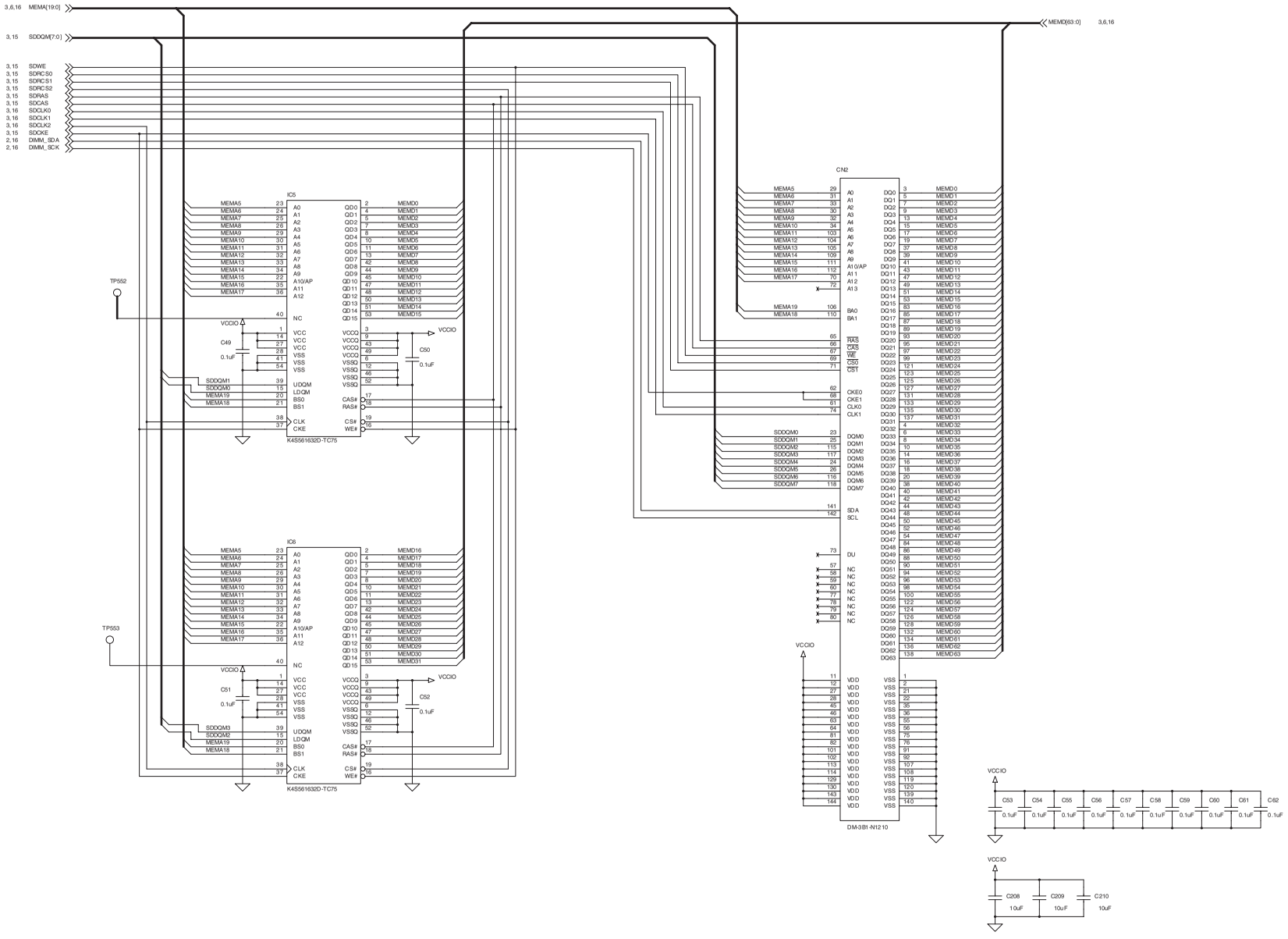

TMPR4927TB_3
4/16

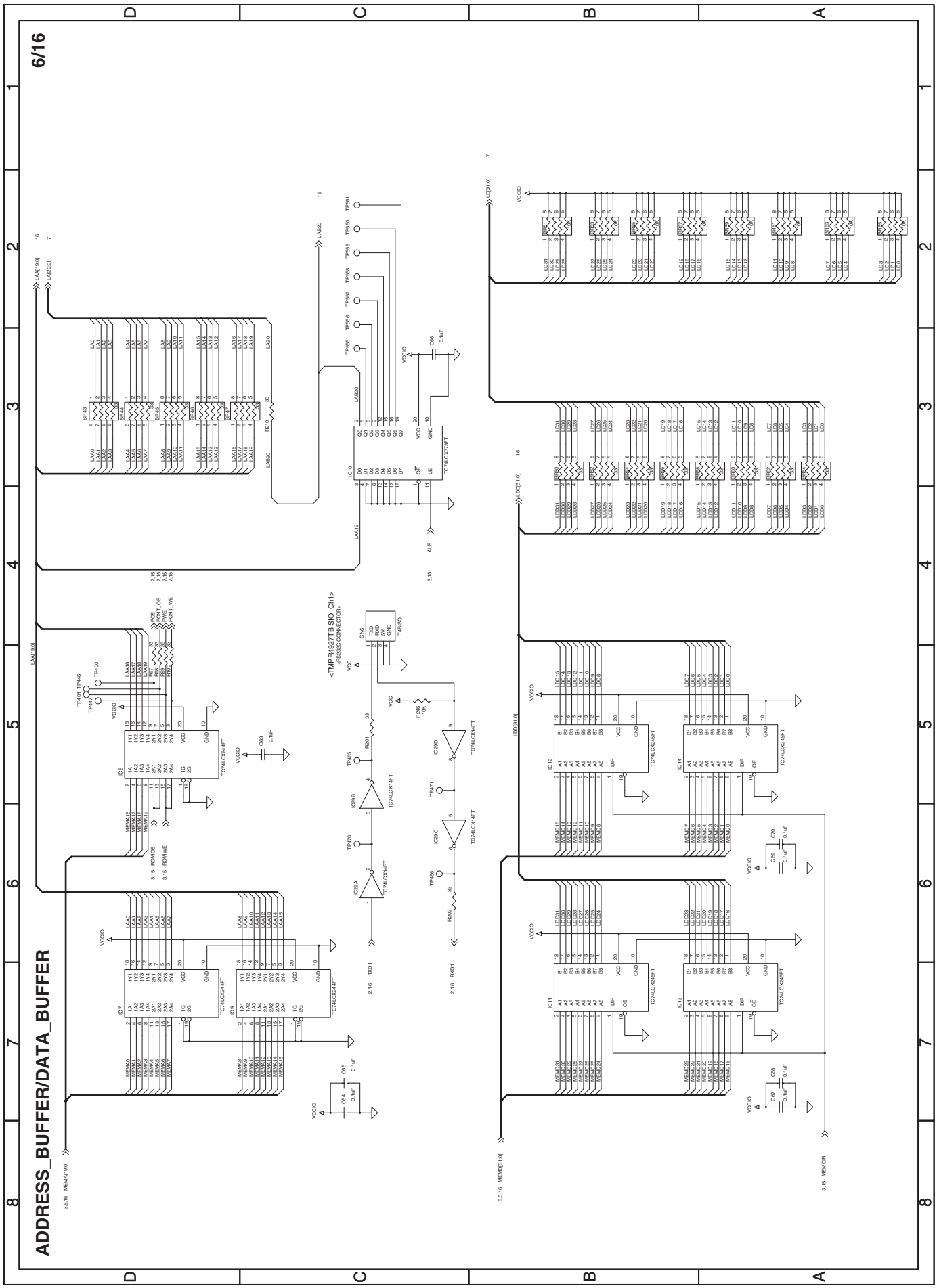
SDRAM

5/16

<On Board : 256Mbit x 2>

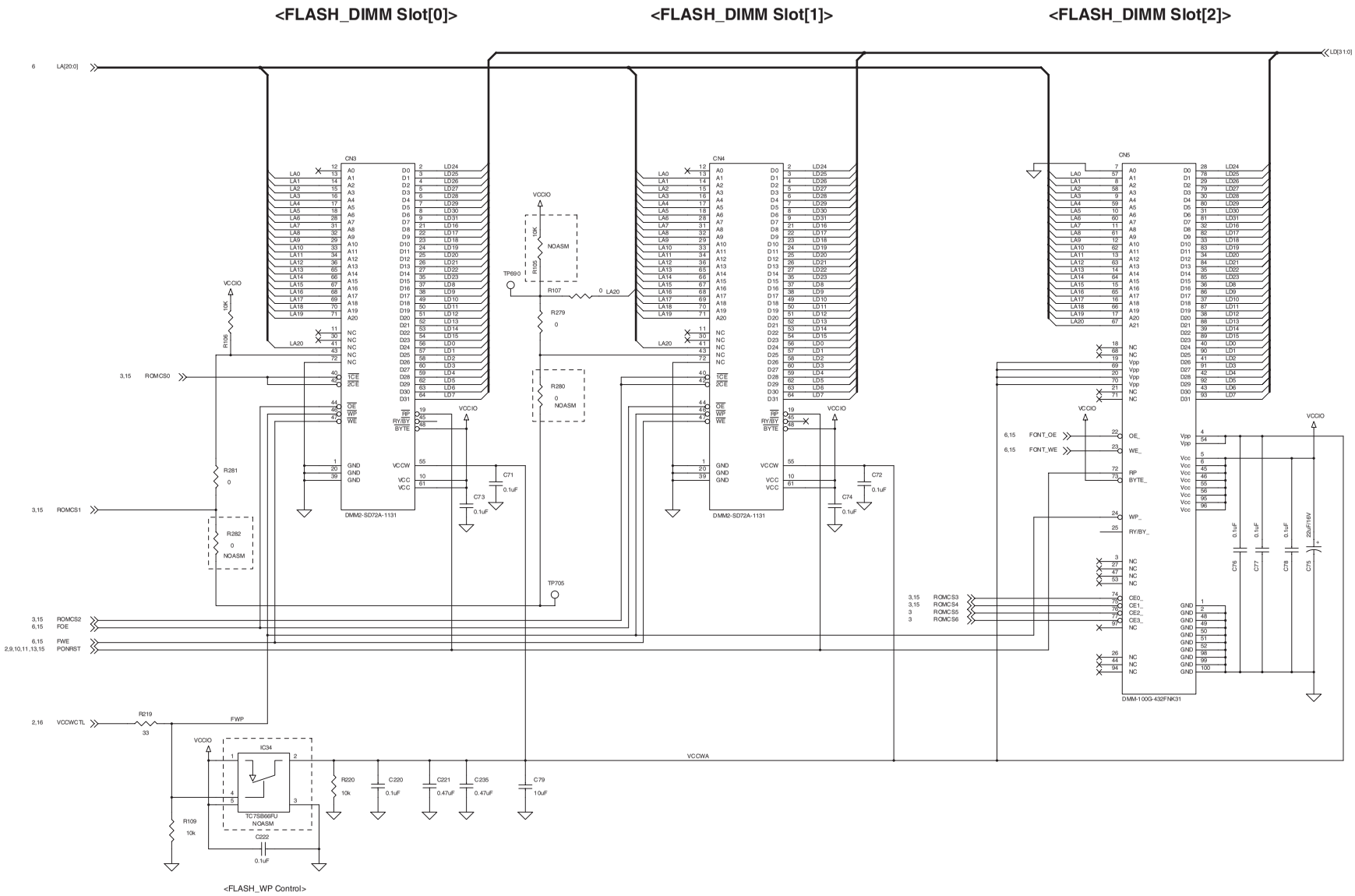
<SDRAM_SODIMM Slot[0]>

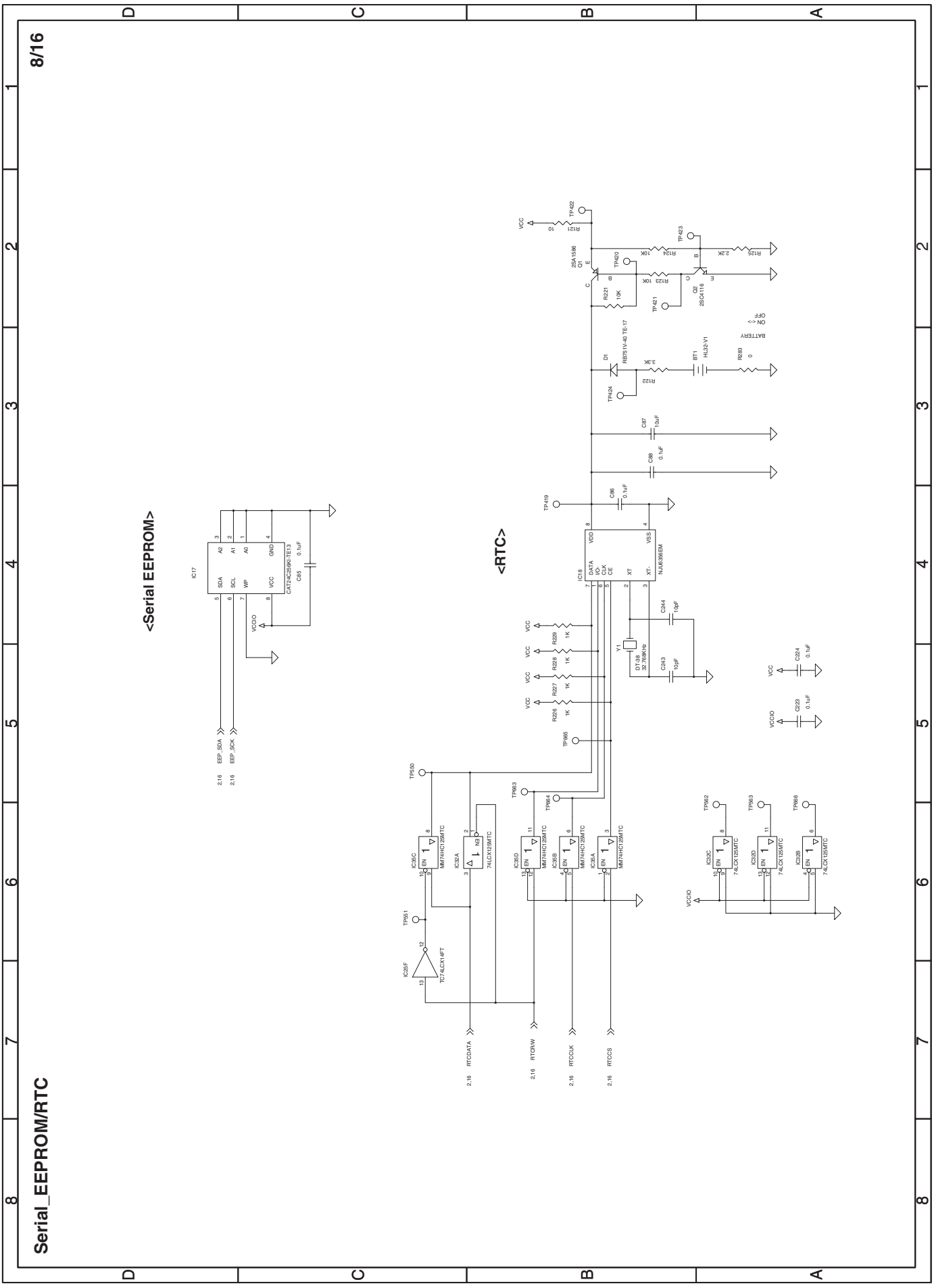



6/16
ADDRESS_BUFFER/DATA_BUFFER
<TMPR4927TB SIO_Ch1>
<RS232C CONNECTOR>
TC74LCX245FT
TC74LCX14FT
TC74LCX541FT
TC74ALCX373FT
TC74ALCX244FT

FLASH

7/16

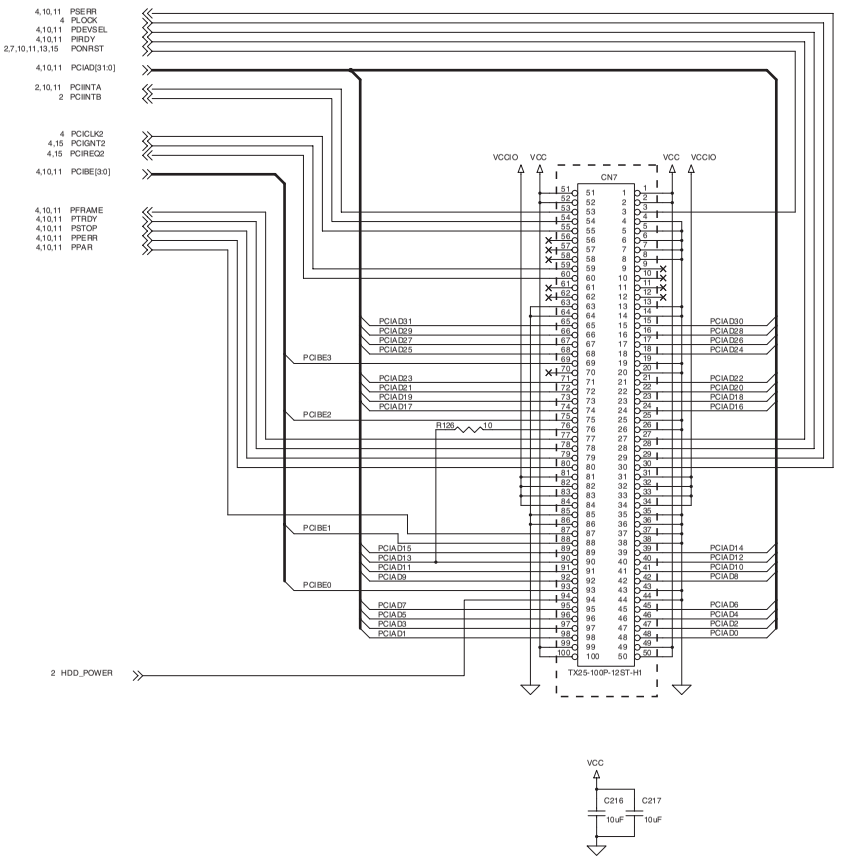

<FLASH_DIMM Slot[0]>
<FLASH_DIMM Slot[1]>
<FLASH_DIMM Slot[2]>
LA[20:0]
LD[31:0]
CN3
CN4
CN5
DMM2-SD72A-1131
DMM-100G-432FNK31
ROMCS0
ROMCS1
ROMCS2
FWE
PONRST
VCCWCTL
FWP
VCCWA
VCCIO
FONT_OE
FONT_WE
ROMCS3
ROMCS4
ROMCS5
ROMCS6
IC34
TC7SB66FU
NOASM
<FLASH_WP Control>

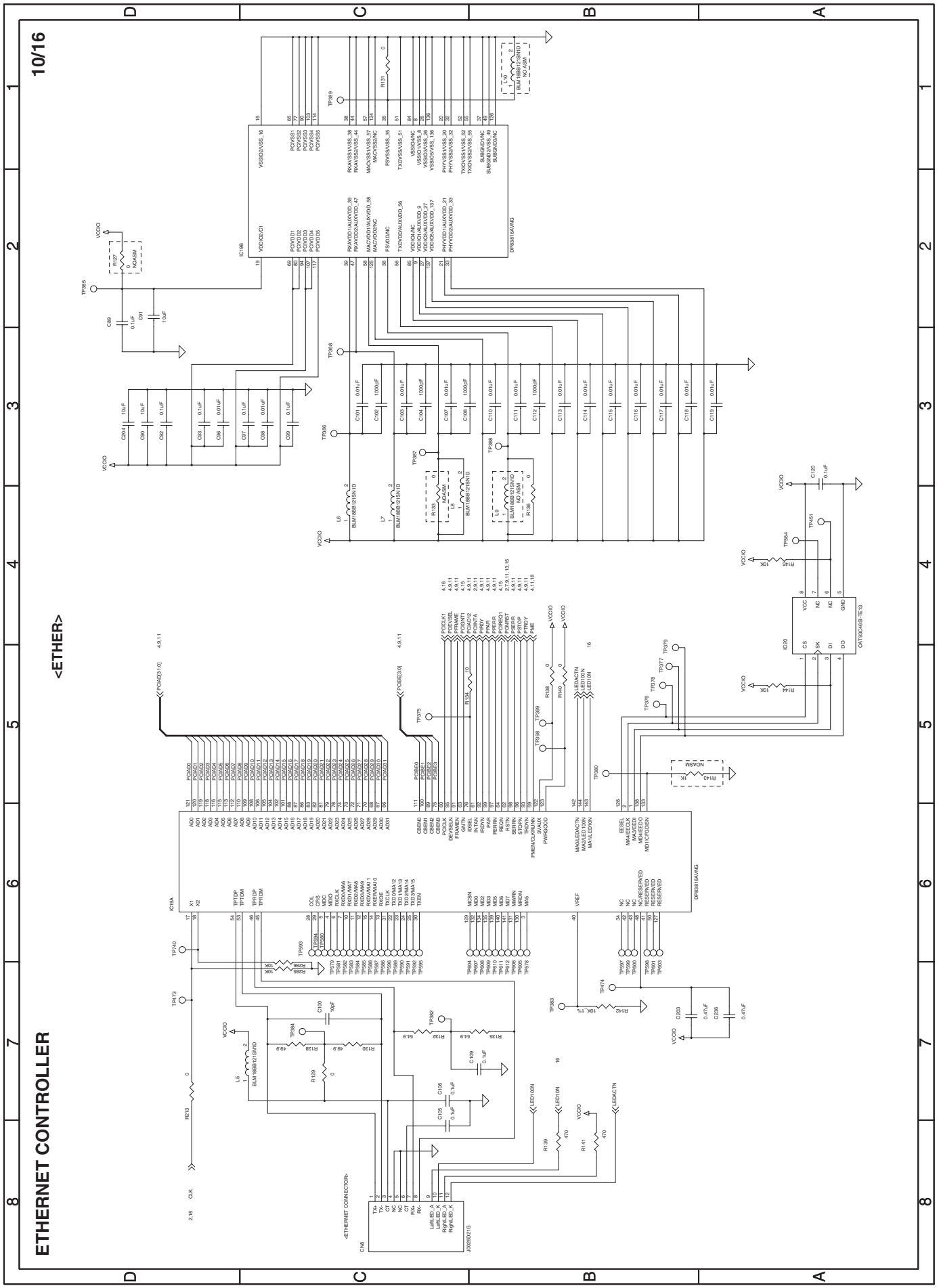

8/16
Serial_EEPROM/RTC
<Serial EEPROM>
<RTC>
IC17
CAT24C256WI-TE13
IC18
NJU6356EM
Q1
2SA1586
Q2
2SC4116
D1
RB751V-40 TE-17
BT1
HL32-V1
Y1
DT-38
32.768KHz
IC26F
TC74LCX14FT
IC35C
IC32A
IC35D
IC35B
IC35A
IC32C
IC32D
IC32B
74LCX125MTC
BM74HC125MTC
EEP_SDA
EEP_SCK
RTCDATA
RTCRW
RTCCLK
RTCCS
VCC
VCCIO
BATTERY
ON <>
OFF

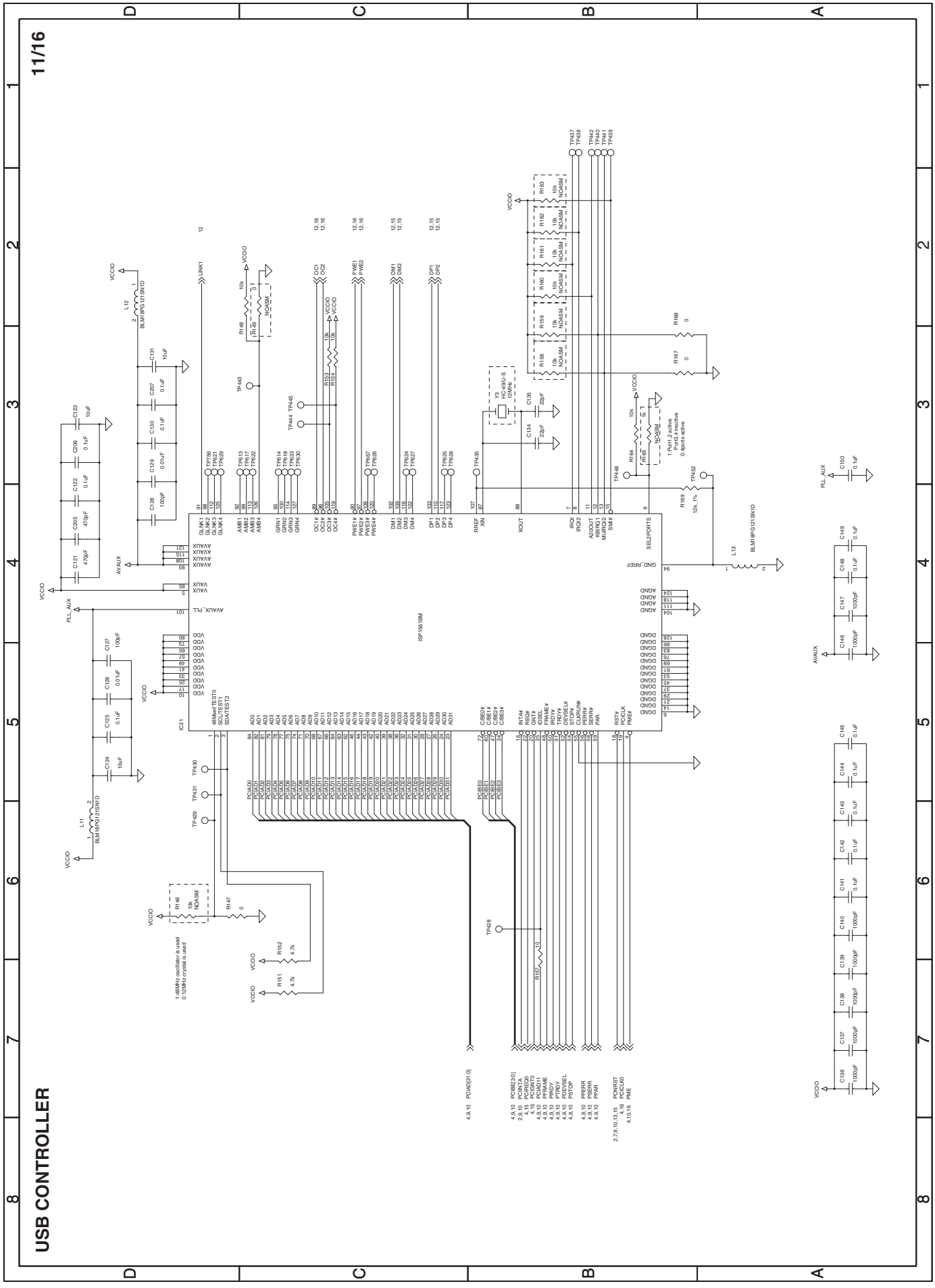
PCI CONNECTOR

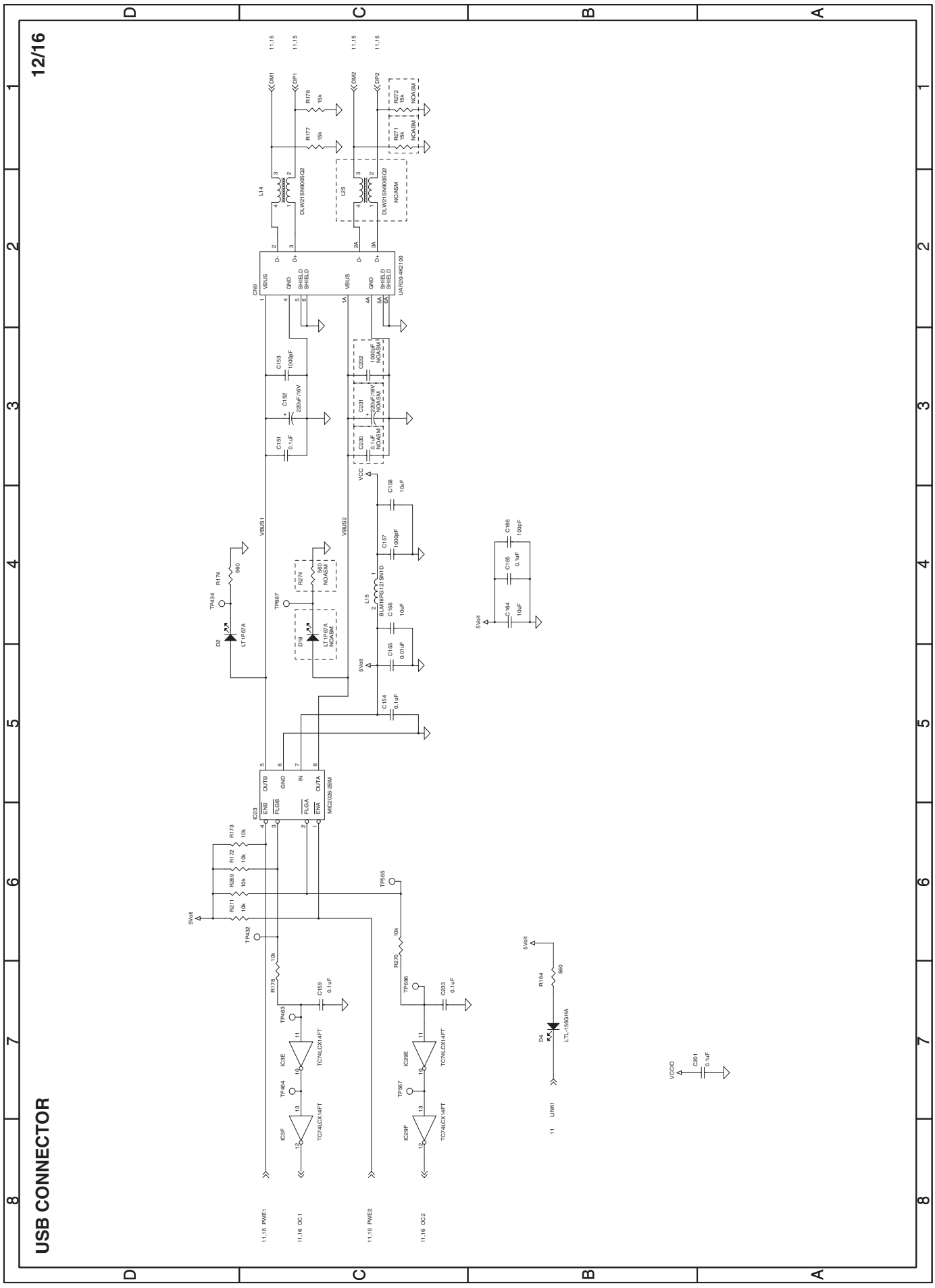
9/16

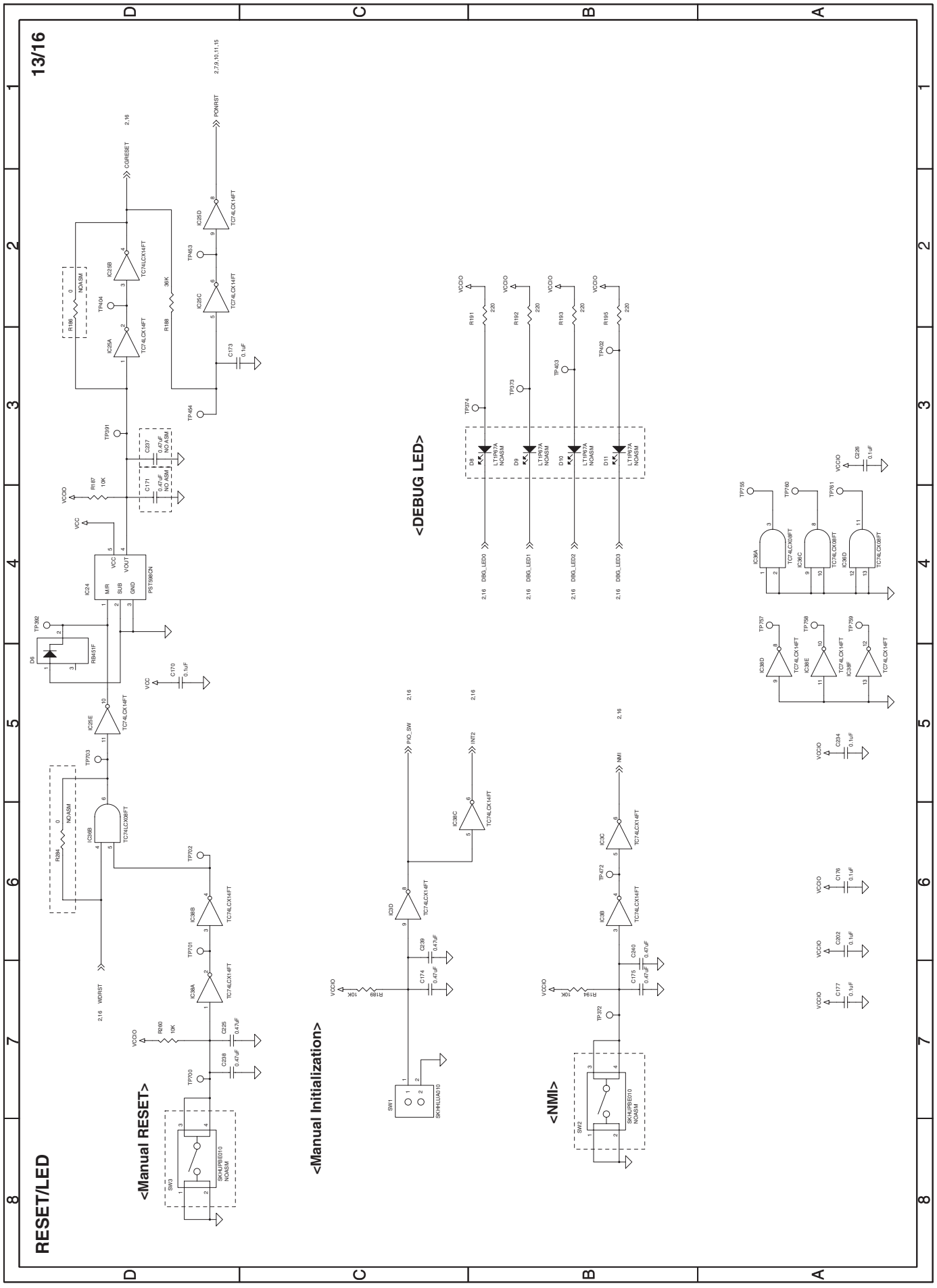
<PCI_Slot [A]>




ETHERNET CONTROLLER
10/16
<ETHER>


USB CONTROLLER
11/16


12/16
USB CONNECTOR


RESET/LED
13/16
<Manual RESET>
<Manual Initialization>
<NMI>
<DEBUG LED>
IC24
PST589CN
IC25A
IC25B
IC25C
IC25D
IC25E
IC36A
IC36B
IC36C
IC36D
IC36E
IC36F
IC38A
IC38B
IC38C
IC3C
IC3D
SW1
SW2
SW3
SK1HLUA010
SK1HJPBE010
NO ASM
CORESET
PONRST
WDRST
NMI
PIO_SW
INT2
DBG_LED0
DBG_LED1
DBG_LED2
DBG_LED3
VCC
VCCIO

POWER

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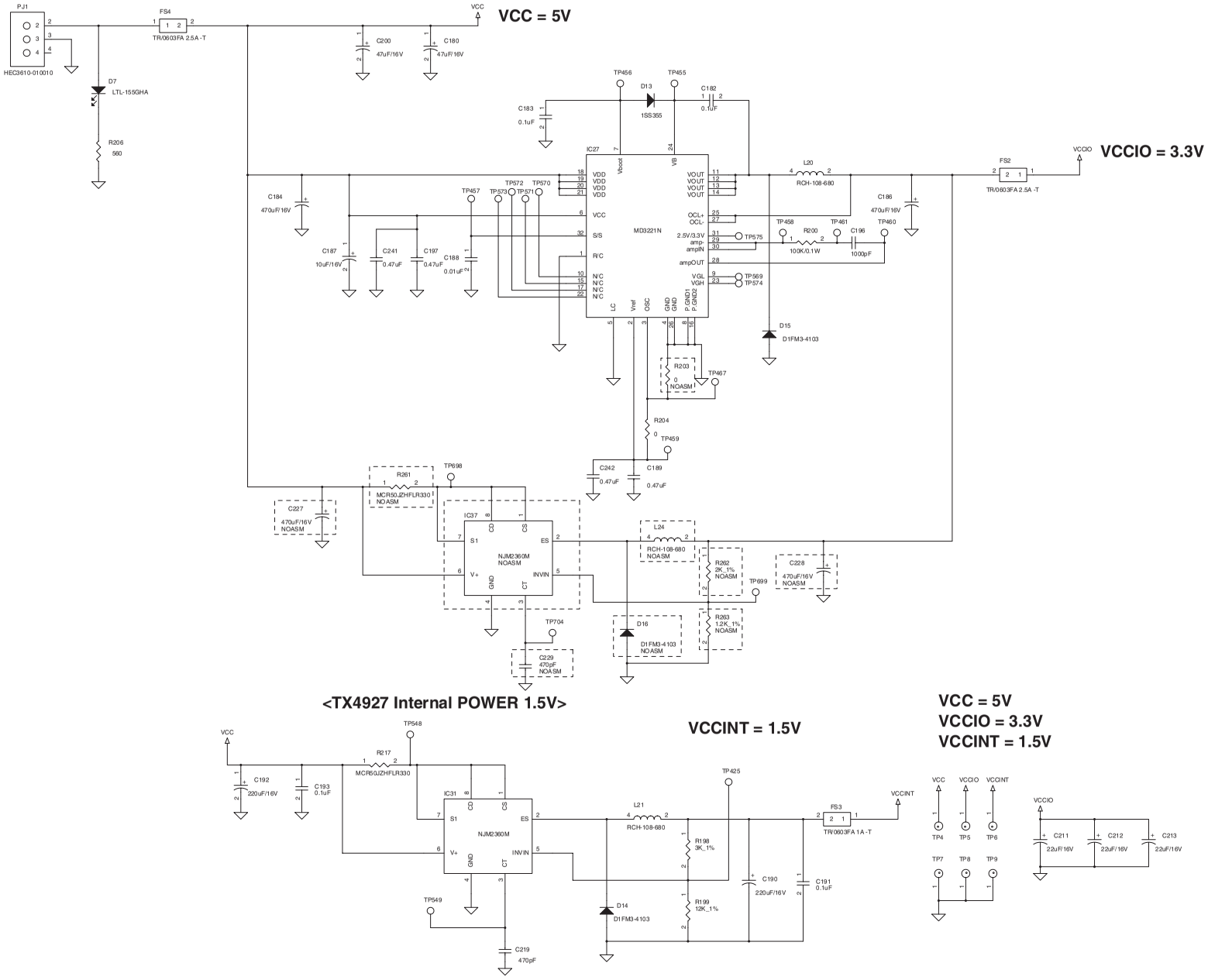
VCC = 5V
VCCIO = 3.3V
<TX4927 Internal POWER 1.5V>
VCCINT = 1.5V
VCC = 5V
VCCIO = 3.3V
VCCINT = 1.5V
PJ1
HEC3610-010010
FS4
TR/0603FA 2.5A -T
D7
LTL-155GHA
R206
560
C200
47uF/16V
C180
47uF/16V
TP456
TP455
D13
1SS355
C182
0.1uF
C183
0.1uF
IC27
MD3221N
Vbost
VB
VDD
VCC
S/S
R/C
N/C
VOUT
OCL+
OCL-
2.5V/3.3V amp-
ampIN
ampOUT
VGL
VGH
LC
Vref
OSC
GND
P.GND1
P.GND2
L20
RCH-108-680
FS2
TR/0603FA 2.5A -T
C184
470uF/16V
C186
470uF/16V
C187
10uF/16V
C241
0.47uF
C197
0.47uF
C188
0.01uF
TP457
TP573
TP572
TP571
TP570
TP458
TP461
TP460
R200
100K/0.1W
C196
1000pF
TP575
TP569
TP574
D15
D1FM3-4103
R203
0
NOASM
TP467
R204
0
TP459
C242
0.47uF
C189
0.47uF
TP698
R261
MCR50JZHFLR330
NOASM
C227
470uF/16V
NOASM
IC37
NJM2360M
NOASM
CD
CS
S1
ES
V+
GND
CT
INVIN
L24
RCH-108-680
NOASM
R262
2K_1%
NOASM
C228
470uF/16V
NOASM
TP699
TP704
C229
470pF
NOASM
D16
D1FM3-4103
NOASM
R263
1.2K_1%
NOASM
TP548
R217
MCR50JZHFLR330
C192
220uF/16V
C193
0.1uF
IC31
NJM2360M
L21
RCH-108-680
FS3
TR/0603FA 1A -T
TP425
R198
3K_1%
R199
12K_1%
C190
220uF/16V
C191
0.1uF
D14
D1FM3-4103
TP549
C219
470pF
TP4
TP5
TP6
TP7
TP8
TP9
C211
22uF/16V
C212
22uF/16V
C213
22uF/16V

TESTPOINT

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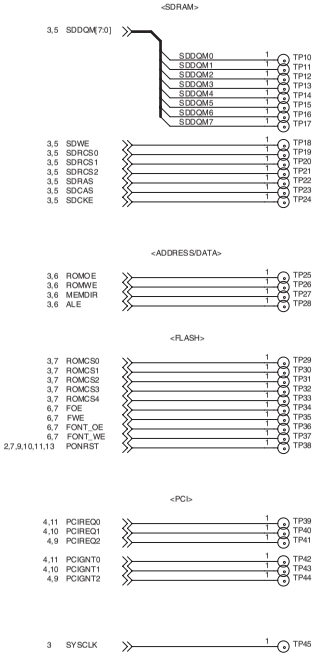
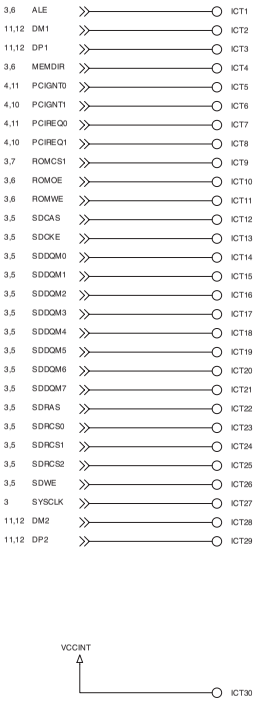
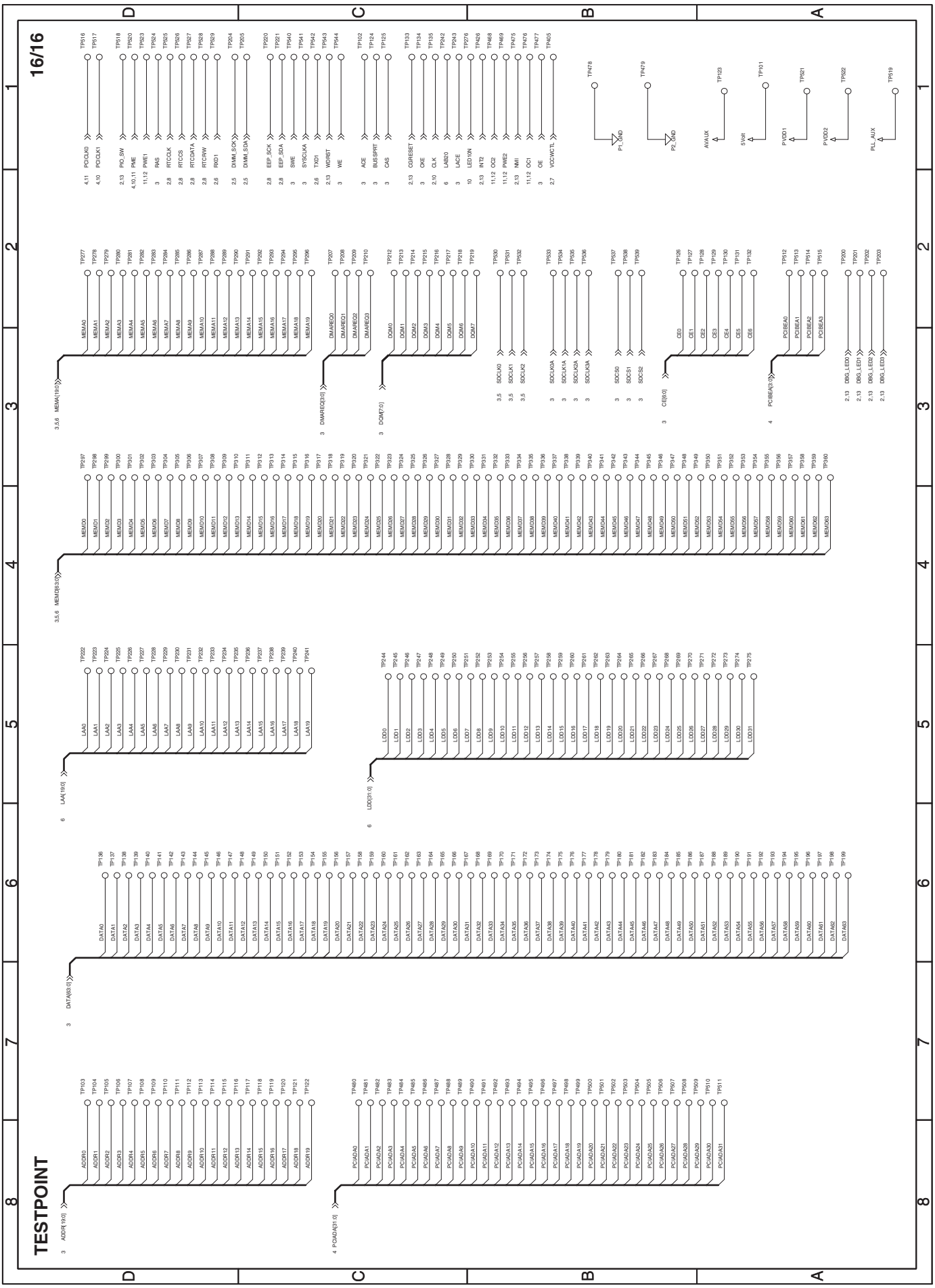
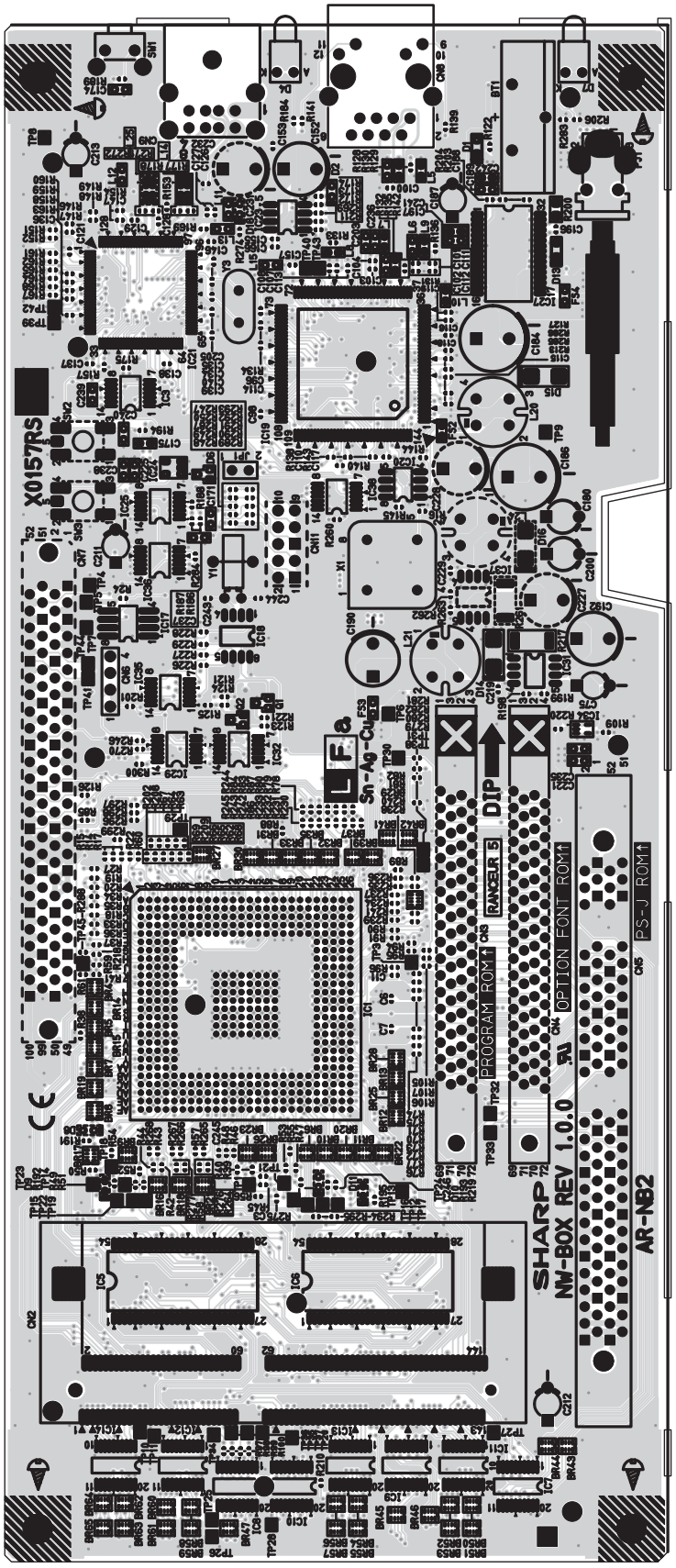




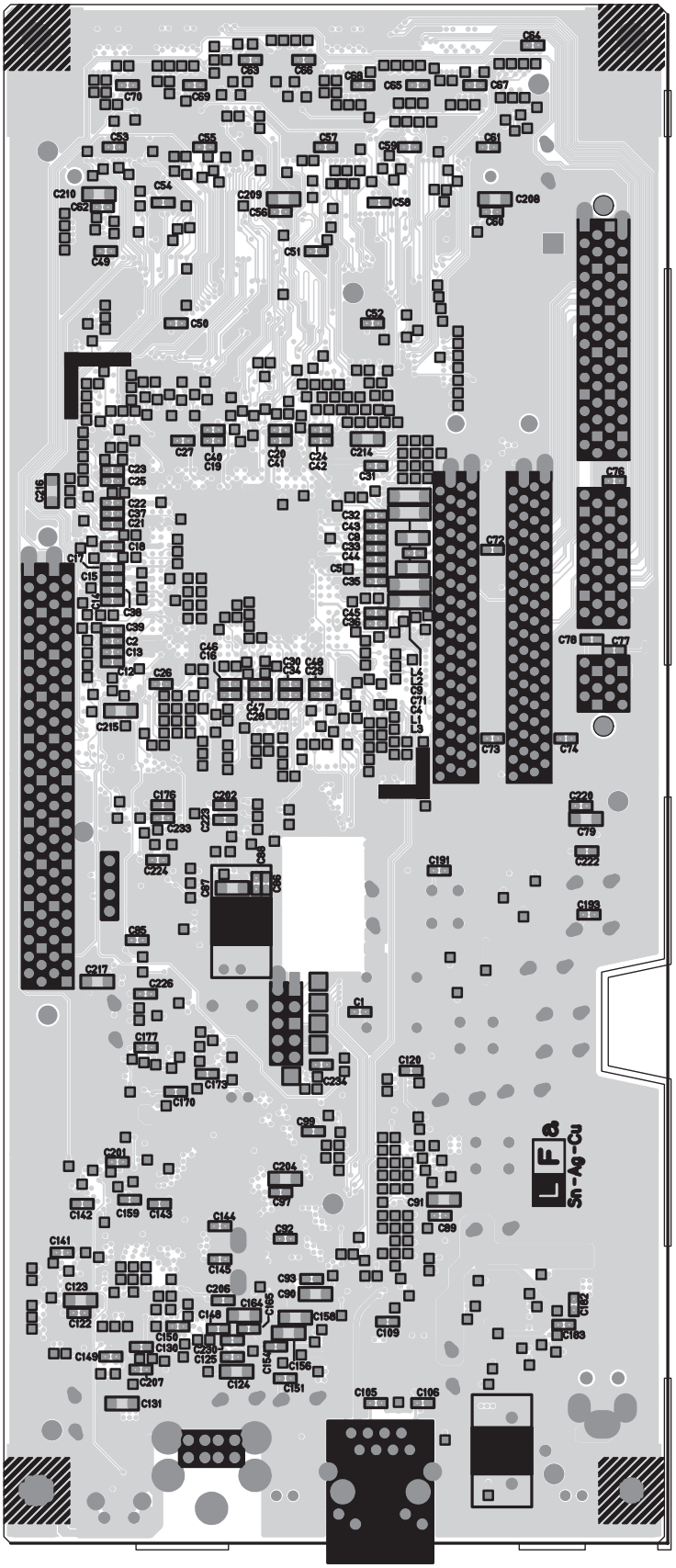

TESTPOINT
16/16

[8] PARTS LAYOUT

1. PARTS SIDE



2. SOLDER SIDE



CAUTION FOR BATTERY REPLACEMENT

(Danish) ADVARSEL !
Lithiumbatteri - Eksplosionsfare ved fejlagtig håndtering.
Udskiftning må kun ske med batteri
af samme fabrikat og type.
Levér det brugte batteri tilbage til leverandoren.

(English) Caution !
Danger of explosion if battery is incorrectly replaced.
Replace only with the same or equivalent type
recommended by the manufacturer.
Dispose of used batteries according to manufacturer's instructions.

(Finnish) VAROITUS
Paristo voi räjähtää,jos se on virheellisesti asennettu.
Vaihda paristo ainoastaan laitevalmistajan suosittelemaan
tyyppiin. Hävitä käytetty paristo valmistajan ohjeiden
mukaisesti.

(French) ATTENTION
Il y a danger d'explosion s'il y a remplacement incorrect
de la batterie. Remplacer uniquement avec une batterie du
même type on d'un type équivalent recommandé par
le constructeur.
Mettre au rébut les batteries usagées conformément aux
instructions du fabricant.

(Swedish) VARNING
Explosionsfara vid felaktigt batteribyte.
Använd samma batterityp eller en ekvivalent
typ som rekornmenderas av apparattillverkaren.
Kassera använt batteri enligt fabrikantens
Instruktion.

(German) Achtung
Explosionsgefahr bei Verwendung inkorrekter Batterien.
Als Ersatzbatterien dürfen nur Batterien vom gleichen Typ oder
vom Hersteller empfohlene Batterien verwendet werden.
Entsorgung der gebrauchten Batterien nur nach den vom
Hersteller angegebenen Anwerisugen.

CAUTION FOR BATTERY DISPOSAL

(For USA,CANADA)

"BATTERY DISPOSAL"
THIS PRODUCT CONTAINS A LITHIUM PRIMARY
(MANGANESS DIOXIDE) MEMORY BACK-UP BATTERY
THAT MUST BE DISPOSED OF PROPERLY. REMOVE THE
BATTERY FROM THE PRODUCT AND CONTACT YOUR
LOCAL ENVIRONMENTAL AGENCIES FOR INFORMATION
ON RECYCLING AND DISPOSAL OPTIONS.

"TRAITEMENT DES PILES USAGÉES"
CE PRODUIT CONTIENT UNE PILE DE SAUVEGARDE DE
MÉMOIRE LITHIUM PRIMAIRE (DIOXYDE DE MANGANESE)
QUI DOIT ÊTRE TRAITÉE CORRECTEMENT. ENLEVEZ LA
PILE DU PRODUIT ET PRENEZ CONTACT AVEC VOTRE
AGENCE ENVIRONNEMENTALE LOCALE POUR DES
INFORMATIONS SUR LES MÉTHODES DE RECYCLAGE ET
DE TRAITEMENT.

TOSHIBA

TOSHIBA TEC CORPORATION
2-17-2, HIGASHIGOTANDA, SHINAGAWA-KU, TOKYO, 141-8664, JAPAN